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THREE ESSAYS ON WELFARE POLICIES IN AMERICAN STATES: EXPLAINING AMERICAN WELFARE STATES IN THE POST-WELFARE REFORM ERA

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DISSERTATION

A dissertation submitted in partial fulfillment of the
requirements for the degree of Doctor of Philosophy in the
Graduate School at the University of Kentucky

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2019

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ABSTRACT OF DISSERTATION

THREE ESSAYS ON WELFARE POLICIES IN AMERICAN STATES:
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This dissertation consists of three empirical studies that address questions regarding state welfare policy making in the post-welfare reform era. The first empirical study pays close attention to the Temporary Assistance for Needy Families (TANF) as a federal block grant program, which is a big departure from most previous TANF studies, to ask why American states differ in their decisions to allocate federal block grants across specific programs. Drawing on research on fiscal federalism and state and cross-national welfare politics, the study uses cross-sectional time-series data covering 50 states over the fiscal years 2004-2016 to examine factors that have an impact on state child care spending under the TANF block grant. The results show that several political factors and one socio-economic factor impact states' TANF child care spending in the hypothesized direction. Most importantly, the study finds that a specific state government's TANF policy designed to encourage work matters in an interesting way. States' emphasis on work of TANF recipients, measured by the existence of the TANF job-search rule, exerts a positive, independent effect on the percentage of state TANF child care spending, but the positive marginal effect of implementing the job-search rule becomes negative as the percentage of female state legislators passes 28%. The study shed lights on our general understanding of the factors that influence state allocations of federal block grants for an understudied but increasingly important policy program in the American states—child care.

The second empirical study examines whether the selection of indicators of welfare policy commitment makes any difference for the findings in studies of the determinants of state welfare policy. If so, what difference does it make? While scholars of state welfare politics have long been making efforts to find better explanations for variation in welfare policy across American states, the literature as a whole has paid little attention to how differently scholars operationalize state welfare policy even though they examine a variety of welfare policy measures. To address these questions, I estimate a series of different panel data models with different measures of state welfare commitment for the period after the welfare reform of 1996. Comparing the results across these models shows that the choice of dependent variable measures affects the estimation results, thereby suggesting that empirical findings are dependent upon the measure we use. This finding not only shows that scholars need to be cautious in interpreting their results but also opens up a new puzzle as to why a factor affects a particular welfare measure but not others.

The last empirical study addresses the question: do the effects of party politics differ across welfare policies? In answering this question, the study draws on the literature on deservingness and social construction of target populations and hypothesizes that party politics would play a differential role in explaining the generosity of different welfare policies depending on the perceived deservingness of target populations. To test this hypothesis, I estimate three models each for TANF, Supplemental Security Income-State Supplements (SSI-S), and Medicaid generosity covering the period after the welfare reform. I find that party politics still remains as an important predictor of state welfare generosity, especially where welfare policy for the deserving poor and mixed population in terms of its deservingness is concerned. Also, there are differential effects of party politics across the welfare policies examined, but sometimes in an unexpected direction. This study provides a valuable addition to the literature in that it updates and enriches our understanding of welfare politics.

KEYWORDS: TANF Child Care Spending, Welfare Measures, Welfare Commitment and Generosity, State Welfare Politics, Deservingness, Target Populations

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06/21/2019

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Date

DEDICATION

I dedicate this dissertation to my family.

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CHAPTER 1

INTRODUCTION

This dissertation aims to contribute to our understanding of state welfare policy making in the post-welfare reform era by broadening the limited scope of scrutiny in the existing literature. The passage of the 1996 Personal Responsibility and Work Opportunity Reconciliation Act (PRWORA) has provided scholars a great opportunity to examine the consequences of rendering states a wide discretion over designing and implementing welfare programs, resulting in many studies over the past 20 years. Despite this, however, the welfare scholarship has left out some important aspects in the realm of welfare research. Paying attention to where relatively scarce attention has been made, all three papers in the dissertation examine variation in welfare policy across American states while providing a different focus in each paper.

In Chapter 2, I pay attention to the Temporary Assistance for Needy Families (TANF) program and examine what factors explain the variation across states in the emphasis on child care under TANF. To address this question, I estimate the model using panel data covering 50 states over FY 2004-FY 2016 while paying particular attention to the role of TANF policy and its interaction with the presence of female legislators in a state. The analysis in the chapter extends the TANF scholarship in two ways. First, recognizing that the previous scholarship has not evaluated TANF as a block grant program, this study focuses on child care as one of the important spending categories under TANF and asks why American states differ in their decisions to allocate TANF funds to child care. Second, I turn our attention to TANF policy as one of the possible factors explaining the TANF output. Scholars have focused on variation in TANF policy across states as the phenomenon to be explained, but not a factor that could lead to variation in the way states use TANF block grants. Therefore, I test whether the presence of a job-search requirement for TANF cash benefit determines the percentage of total federal and state TANF expenditures used for child care.

In Chapter 3, I investigate whether the choice of one state welfare commitment measure instead of another as a dependent variable changes the results in analyses. This question has not been discussed in the literature, but it is a fundamental question that can have important implications for both state welfare policy making and the welfare politics scholarship. Answering this question proceeds with the following three steps. I first review previous studies to see how scholars have operationalized state welfare policy as a dependent variable and whether they have found consistent findings across studies with regard to the most frequently studied independent variables. Next, I discuss how we might conceptualize welfare in the American context, which leads me to construct three different measures of state welfare policy commitment that reflect a different scope of welfare depending on how we define the concept. Finally, with these measures, I estimate three models using panel data covering 50 states over FY 1999-FY 2010 and compare the results across the models. The study in this chapter gives directions to future research by opening up new questions as to why a certain factor matters for a particular kind of welfare commitment measure but not others.

In Chapter 4, I ask whether the effect of party politics differs across welfare policies, paying particular attention to the perceived deservingness of target populations and its implication for state welfare generosity. I hypothesize that the influence of party competition and party control on the generosity of welfare policies will differ depending on the perceived deservingness of target populations. I test this hypothesis with three welfare policies serving different target populations—i.e., TANF, Supplemental Security Income-State Supplements (SSI-S), and Medicaid—and compare the results. This chapter updates and expands the existing literature by addressing the old debate regarding party politics and its relationship to state welfare policymaking. Concluding the dissertation, the last chapter discusses the connections between two empirical studies in Chapter 3 and Chapter 4.

CHAPTER 2

DO GOVERNMENT POLICIES MATTER? STATE CHILD CARE SPENDING UNDER THE TEMPORARY ASSISTANCE FOR NEEDY FAMILIES PROGRAM

2.1 Introduction

Why do states differ in their allocations of federal block grants to specific programs? Students of fiscal federalism have long been interested in how states use federal money rendered in the form of a block grant and how such programs influence state policies and outcomes. The Personal Responsibility and Work Opportunity Reconciliation Act (PRWORA) of 1996, also known as the 1996 Welfare Reform Act, instituted a federal block grant called Temporary Assistance for Needy Families (TANF), providing scholars ample opportunity to examine why states allocate funds differently. However, aside from a few descriptive studies (Schott, Floyd, & Burnside, 2019), little research attempts to explain the variation in TANF funding allocations across the states. Instead, most scholarly interest has focused on explaining differences in total state TANF spending (Ewalt & Jennings, 2014; Rodgers & Tedin, 2006), the stringency of states' TANF policies for benefits, eligibility, and sanctions (Fellowes & Rowe, 2004; Filindra, 2002; Soss, Schram, Vartanian, & O'Brien, 2001; Zedlewski, 1998) and variation in state TANF policy outputs such as TANF children coverage or TANF cash generosity (Bentele & Nicoli, 2012; Brunch, Meyers, & Gornick, 2018).

One important allocation choice involves the decision about child care spending. Understanding TANF spending on child care across states and over time is important for several reasons. The federal government and the states have put much more emphasis on supporting child care with TANF funds since the passage of the welfare reform act

(Waldfogel, 2001). In fact, child care for low-income families is stated as one of the core welfare reform areas together with basic assistance for families with children and work-related activities or supports. Because TANF changed the emphasis from stay-at-home parenting in the Aid to Families with Dependent Children (AFDC) program to working as a requirement for receiving benefits, the provision of child care is a major issue for moving people from assistance to work. From the point of view of the welfare recipient, child care is such an important aspect of TANF because welfare recipients, mostly single-mother families, have difficulties seeking employment and securing child care at the same time. Provision of child care can help recipients transition off welfare and make a living.

The growing share spent on child care over time demonstrates that child care is an important and timely issue; child care spending in total TANF funds almost doubled from 9.3 % in FY 1998 to 17 % in FY 2016 (U.S. HHS, 2019). Despite its growing importance, however, the U.S. governments provide relatively little public assistance for child care compared to many industrialized countries in Western Europe (Lokteff & Piercy, 2012; Ng, 2006; White, 2009). Average total public spending on child care and early childhood education of 32 OECD countries is 0.7% of GDP, while the U.S. governments spend only 0.35 % of GDP. Among 31 OECD countries, the U.S. ranked 29th on this measure as of 2013 (OECD, 2016). Also, when only public child care spending is compared, the U.S. is ranked at the bottom among the 23 OECD countries compared (OECD, 2016).

Although more than 20 years have passed since the PRWORA was enacted, the question of how different states allocate TANF funds to child care has received little scholarly attention. The lack of attention is surprising because state governments are key players in deciding how federal block grant funds under TANF are allocated. With greater flexibility given to states, it was foreseeable that states would allocate and use TANF funds in a varying manner. Figure 2.1 displays the trend in the percentage of TANF funding spent on child care in five states. One can observe tremendous variation in the way states spend TANF funds to child care over time. For example, Kansas and Idaho spent a similar proportion of TANF funds on child care in FY 2004, 15.5% and 15.4%, respectively. However, child care spending over the next 13 years proceeded along a very different trajectory in these two states, with Kansas reducing such spending to 4.3% in FY 2013 while Idaho was increasing that spending to 27.1% in the same year. The dramatic differences raise the question of what accounts for such wide variation across states over time in their TANF spending on child care.

Drawing from research on fiscal federalism and state and cross-national welfare politics, I develop several hypotheses about how different types of factors should influence state TANF spending on child care and why some states would spend more than others on child care over the time period examined. By studying TANF child care spending, this research not only contributes to our general understanding of the factors that influence different state spending of federal block grants, but also more specifically our understanding of an understudied but increasingly important policy program in the American states—child care. More specifically, this study examines the power of various factors that influence state TANF child care spending with an emphasis on state TANF policy as a potential driving force of variation in TANF child care spending across states.

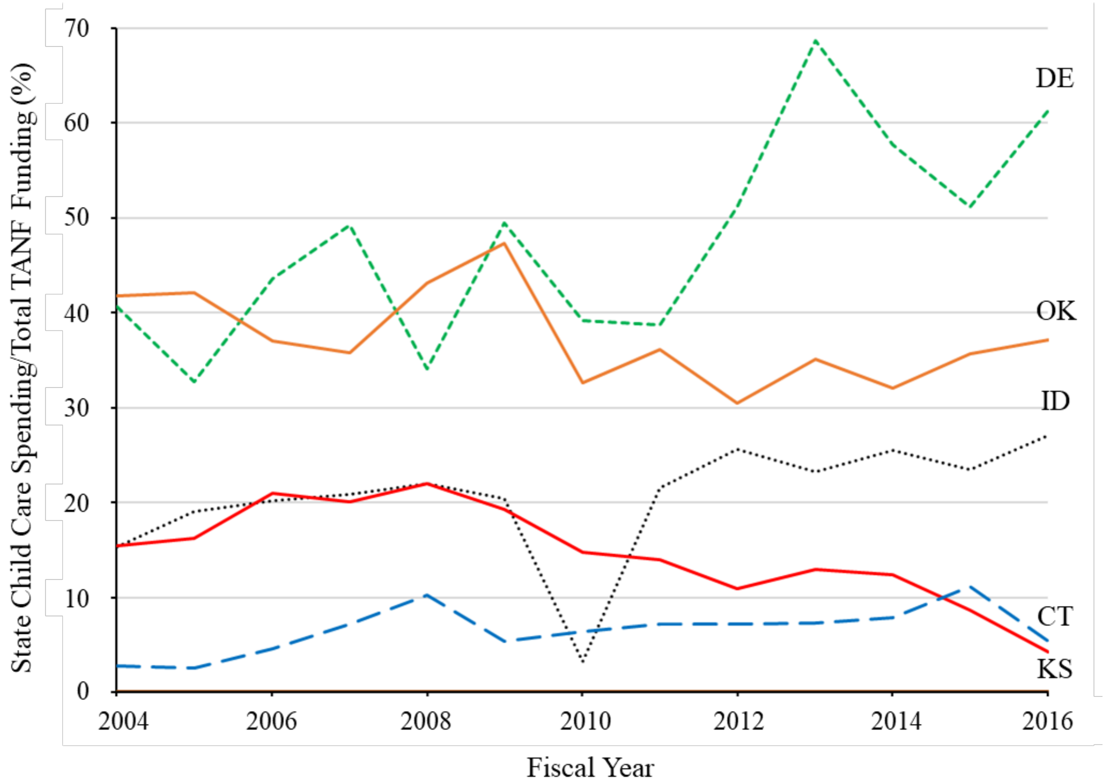

Figure 2.1 The share of TANF funds spent on child care in five states, FY 2004-FY 2016

Note: The Y-axis represents the proportion of state TANF funds spent on child care, and the X-axis represents fiscal years.
Source: The authors' calculation based on Center on Budget and Policy Priorities (CBPP) TANF data and TANF expenditure data collected by the Department of Health and Human Services (DHH).

2.2 Why do States Differ in Their Welfare Policies and Spending?

2.2.1 Political and Socio-Economic Factors

State welfare politics literature has mainly payed attention to two groups of factors to explain variation in welfare policies across states: political and socio-economic variables. States' TANF child care spending can be also thought of as governments' response to different kinds of political and socio-economic conditions that are generally outside of state governments' direct control. First, students of state welfare politics have examined citizen's policy preferences or broad ideological orientation as a driving force of variation and changes in state policy. A few scholars find that this political force from below is one of the critical factors that influence welfare policy and the level of welfare expenditures in states (Erikson, Wright, & McIver, 1993; Fellowes & Rowe, 2004; Filindra 2012; Ringquist, Hill, Leighley, & Hinton-Andersson, 1997; Soss et al., 2001). Implicit in the argument that state governments respond to preferences of their citizens is that state governments make policy choices in a democratic political system in which state citizens elect state policy makers who are expected to represent citizens' policy preferences (Powell, 2004). A few studies test this democratic responsiveness of government by looking at the correspondence between state public ideology and the ideological leaning of state public policy. Among others, Erikson and his colleagues, using a composite measure of eight policies issues including AFDC, make a convincing argument that public opinion is important and is even a more important factor than socioeconomic factors in explaining state policy choices. They argue that the electoral process works to transform citizens' policy preferences into state policy; a more liberal public ideology leads to more liberal state policies under certain conditions (Erikson et al., 1993). Several subsequent studies also found a positive association between state citizens' ideology and state welfare policy (Ewalt & Jennings, 2014; Fellow & Rowe, 2004; Ringquist et al., 1997; Soss et al., 2001).

The ideological leaning of state governments—i.e., state governments' ideology or the partisan control of government— is another widely examined political factor that has been found to impact state welfare policy making. Although scholars do not agree on how to operationalize these concepts (Brown, 1995; Smith, 1997), they nevertheless matter. Liberal state governments tend to be more generous in assisting the poor than their conservative counterparts, in part, because they are elected by more liberal constituents. Consequently, they spend more welfare money, allocate greater benefits, and have less restrictive benefit eligibility rules (Fellowes & Rowe, 2004; Flavin, 2015; Hill & Leighly, 1992; Rom, 1999; Smith, 1997; Soss et al., 2001).

Also, both state-level and cross-national studies show evidence that female legislators tend to give more priority to women's interests and voice liberal opinions on a wide array of issues compared to their male counterparts (Barrett, 1995; CAWP, 2001; Poggione, 2004; Reingold & Smith, 2012; Thomas & Welch, 1991; Welch, 1985). Gender differences in legislators' policy preferences come from different experiences and responsibilities women have in their private sphere (Mandel & Dodson, 1993). Poggione's (2004) study, which uses survey data to examine welfare policy preferences of female and male state legislators, shows that female legislators are more likely to hold liberal preferences on welfare policy than their counterparts. Investigating states' TANF policy adoption following the welfare reform, Payne (2013) finds that states with higher percentage of female legislators are likely to create a more progressive welfare environment than those with lower percentage of female legislators. Moreover, Hawkesworth and her colleagues document that female legislators made efforts to expand the proposed PRWORA to include child care provisions in the process of drafting and developing the bill (Hawkesworth, Casey, Jenkins, & Kleeman, 2001).

Socio-economic factors compose a second group of factors that scholars consider in explaining variation in state welfare policy. A functionalist argument that societal needs for welfare are associated with an expansion of welfare programs is well received in the welfare development literature. Focusing on variation in welfare service provision in post-industrial democracies, comparative national studies demonstrate that new social needs give rise to an expansion of welfare programs (Bonoli & Reber, 2010; Wilensky, 1975). Scholars consider this factor in the American states' context as well, but with two conflicting expectations. While some scholars hypothesize that social needs should be positively associated with state welfare policy (Fry & Winter, 1970), others predict that states may get tougher to counter the growing welfare dependency in their states with less generous welfare policy (Soss et al., 2001). Based on these contradictory arguments, Fellowes and Rowe (2004) posit that social needs could have either positive or negative influence on state welfare policy. Findings from these studies are mixed, but overall suggest that societal needs matter for welfare policy in the states. Whereas Soss et al. (2001) only find a partial support for their thesis, Fry and Winters (1970) and Fellowes and Rowe (2004) find evidence to support the positive influence of social needs factors on state welfare policy. Fellowes and Rowe (2004) show that states respond to a higher level of welfare needs by providing more generous cash benefits and implementing less restrictive eligibility policy. They argue that their findings on welfare demand indicate that policy makers react compassionately toward those in need of assistance.

Many studies investigate the racial composition of state population or welfare recipients as an important predictor of welfare policy across states. Since Wright (1977) first found the backlash effect of African-American state population on AFDC generosity, numerous studies have tested whether the backlash effect is also present in different policy contexts (Avery & Peffley, 2005; Bentele & Nicoli, 2012; Matsubayashi & Rocha, 2012; Reingold & Smith, 2012; Soss et al., 2001). The negative relationship between black population or black welfare recipients and state welfare policy is found both in pre 1996 welfare reform (Barrilleaux & Bernick, 2003; Brown, 1995; Plotnick & Winters, 1985) and post 1996 welfare reform era (Fellowes & Rowe, 2004; Reingold & Smith, 2012; Soss et al., 2001). Also, a study that examines the period that spans before and after the welfare reform in 1996 reports that the size of black population has a negative impact on state total welfare expenditures (Matsubayashi & Rocha, 2012). These findings regarding each of these political and socio-economic forces lead us to expect that variations in citizen ideology, government ideology, female legislators, societal needs, and the proportion of racial minorities among TANF recipients will affect the spending of TANF funds.

2.2.2 A Missing Piece: State TANF Policies as State Policy Intentions

The Personal Responsibility and Work Opportunity Reconciliation Act of 1996 (PRWORA) devolved program authority to state governments, which created a policy environment where states could perform as laboratories of democracy. Therefore, the passage of welfare reform triggered much scholarly interest in state welfare politics, particularly focusing on state TANF policies, such as eligibility and sanctioning rules and cash benefit levels. Central to this interest has been seeking an answer to the question of why some states adopt more generous TANF policies than other states. However, only a few studies focus on spending aspects of the TANF block grant (Ewalt & Jennings, 2014; Rodgers & Tedin, 2006), and those studies are limited in the following respects. First, these studies examine cross-state variation in a highly aggregated level of TANF expenditures—i.e., total TANF expenditures used by states, but do not look at categories or subcategories under the TANF block grant. Investigating TANF spending as a whole might show us a general picture of why total TANF spending varies across states.

However, since expenditure categories on which states spend TANF money are not identical in the proportion of TANF spending allocated to the category, lumping TANF funds together obscures what might matter for a particular spending category, such as child care spending. Second and more importantly, previous studies that examine TANF spending levels tend to ignore the effect of state TANF policies on policy output. State TANF policies are examined exclusively as dependent variables, but previous studies do not consider the possibility of state TANF policies having an impact on the pattern of state TANF expenditures.[1]

Findings from the literature on the effects of federal block grants on state spending show that states do shape the distribution of grants in a certain direction (Fossett, 1987; Jacobsen & McGuire, 1996; Morgan & England, 1984). Also, studies buttress this finding by showing that states' TANF policies vary in terms of generosity to welfare recipients and that state TANF policy designs reflect the intentions of policy makers in response to growing caseloads (Fellowes & Rowe, 2004; Soss et al., 2001). These findings suggest, therefore, leaving out state TANF policies from a model would provide an incomplete story as to why states vary in their support for a particular program or a level of spending under a federal block grant. As states have great latitude to design their TANF programs and tailor their welfare spending to the particular needs of the state, state TANF policies represent intentions of state policy makers. For example, state governments could use welfare policy as an instrument to discourage citizens' behavior that is considered counter-normative, such as welfare dependency (Gans, 1995; Handler,

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[1] While Rodgers and Tedin (2006) suggest that strict TANF policy has influence on state TANF tax effort across states, they do not include a state TANF policy variable in their preferred specification model.

1995). Therefore, examining underlying state policy intentions as an explanatory factor would provide a more comprehensive explanation of variation across state welfare policy—in this case, TANF child care spending—over time. In this paper, I incorporate a state TANF policy that is relevant to TANF child care spending as a possible explanatory variable, emphasizing more intentional and active use of welfare policy by states.

In this regard, this study contributes to the literature on state welfare policy by looking at a relatively neglected aspect of the TANF block grant by focusing on TANF child care spending. TANF child care spending is worthy of scholars' attention, given that (1) TANF child care spending level ranks the second highest among other categories of spending under the TANF block grant and (2) that child care support can be critical to welfare recipients' efforts to improve their family's well-being and attain self-sufficiency.[2]

2.3 Explaining TANF Child Care Spending Across the States

This section develops several hypotheses about the factors that influence TANF child care spending in the states. The passage of the Personal Responsibility and Work Opportunity Reconciliation Act (PRWORA or the Personal Responsibility Act) was a watershed moment in the history of American welfare policy. Passing with a relatively high degree of bipartisan support, the Personal Responsibility Act aimed to "end welfare as we know it" by addressing critical issues that have been a focus of debate about welfare in America. To this end, the legislation replaced the federal Aid to Families with Dependent Children (AFDC) program—the primary cash assistance program for low-income families—with the Temporary Assistance for Needy Families (TANF)

[2] Next to spending on basic assistance, which comprises 24% of the total federal and state TANF fund, child care spending amounts to 17% of the total at the aggregate level in FY 2016 (Schott et al., 2019).

program—a state-managed block grant. One central component that distinguishes TANF from previous welfare policy is that, in response to the criticism that governments' welfare programs were increasing dependency instead of encouraging work, it puts heavy emphasis on work and self-sufficiency. Therefore, the legislation set firm time limits on welfare receipt, established work requirements, and allowed state governments to impose much stricter work and work activity requirements in the hope of moving welfare recipients toward employment. At the same time, states implemented a variety of services to promote work, including education programs, job-search, and child care support.

Previous studies suggest that different levels of state welfare spending reflect varying degrees of response to political and socio-economic forces (Ewalt & Jennings, 2014; Fellowes & Rowe, 2004; Rodgers & Tedin, 2006). First, previous literature finds that a more liberal citizen ideology leads to a higher level of spending on welfare programs (Ewalt & Jennings, 2014). However, the current study cannot directly draw on this finding because whether spending on child care denotes more welfare than spending on all other spending categories under the TANF block grant is not straightforward. For example, comparing child care spending and basic cash assistance spending, it is not clear which one reflects a more liberal choice. However, public opinion studies find that the more conservative citizens are, the more they tend to oppose an increase in government spending on child care (Henderson, Monroe, Garand, & Burts, 1995). This empirical finding suggests that states with a more liberal citizen ideology should be expected to spend more TANF money on child care than states with a more conservative ideology, which leads to the following hypothesis:

Hypothesis 1*: On average, states with a more liberal citizen ideology will spend a higher proportion of total TANF spending on child care than more conservative states.*

As more conservative citizens oppose more support for child care (Henderson et al., 1995), we can expect that more liberal governments that represent more liberal citizens' preferences will spend more TANF funds on child care than less liberal governments. In addition, the fact that it was Democratic politicians not Republicans who support funding child care with TANF money buttresses the above-stated expectation (Cohen, 2001, p. 180). Therefore, the second hypothesis follows:

Hypothesis 2*: On average, state governments with a more liberal ideology will spend a higher proportion of TANF on child care than states with a more conservative government ideology.*

Many studies on women in state legislatures argue that female legislators are more likely than their male counterparts to express interest in representing women's interests. In a study of OECD countries, Bonoli and Reber (2010) found that female representation in the national legislative body significantly and positively influenced public spending on child care services. This study suggests that greater representation of women in a policy making body will push states to spend more TANF funds on child care, stated more formally in the following hypothesis:

Hypothesis 3*: On average, states with a higher percentage of women in state legislatures will spend a higher proportion of total TANF spending on child care than states with a lower percentage of female legislators.*

Not only political forces but also societal needs are expected to influence TANF spending on child care. With the increasing degree of maternal employment, policy makers have been concerned that child care costs create a barrier to employment, particularly for single mothers and low-skilled workers. This concern spurred a considerable increase in public funding for child care assistance (Meyers, Heintze, & Wolf, 2002). As a major welfare program that emphasizes "welfare-to-work", TANF programs are designed to promote employment of welfare recipients, and the TANF block grant spent for child care is to support parents who work (non-assistance child care spending) or seek work (assistance child care spending). Therefore, if a state observes more need for child care support, the state would invest more on it.

This study uses three indicators to measure societal needs: unemployment rate, unwed birth rate, and poverty rate. On the one hand, a higher unemployment rate in states could lead to lower spending on child care as unemployment rate being high means fewer women in the work force and less demand for labor which means there is less need for child care assistance. On the other hand, it is likely that state governments push people to work or work activity when the unemployment rate is low, trying to ease the pressures of employers hiring workers in a tighter labor market (Soss et al., 2001), which would be associated with higher spending on child care. A higher unwed birth rate indicates more need for child care support. Single mothers are more likely to be in poverty; thus, they need to look for jobs or participate in economic activities and are less capable of paying for child care themselves. Therefore, this study posits the following hypotheses.

Hypothesis 4-a: *On average, states with a higher unemployment rate will have a lower proportion of TANF child care spending in total TANF spending than those with lower unemployment rates.*

Hypothesis 4-b: *On average, states with a higher poverty rate will have a higher proportion of TANF child care spending in total TANF spending than those with lower poverty rates.*

Hypothesis 4-c: *On average, states with a higher unwed birth rate will have a higher proportion of TANF child care spending in total TANF spending than those with lower unwed birth rates.*

Many scholars find evidence of racism as an explanation for state welfare policy choices (Barrilleaux & Bernick, 2003; Brown, 1995; Matsubayashi & Rocha, 2012; Wright, 1977). Moreover, post welfare reform studies also report that states with a higher percentage of African-American TANF recipients are less generous on welfare provisions (Fellowes & Rowe, 2004; Soss et al., 2001). Therefore, I expect that this biased attitude toward black recipients would be applied to the case of TANF child care spending.

Hypothesis 5-a: *On average, states with a higher percentage of African-Americans among total TANF recipients will have a lower proportion of TANF child care spending in total TANF spending than those with a lower percentage of African-American TANF recipients.*

Hypothesis 5-b: *On average, states with a higher percentage of Hispanics among total TANF recipients will have a lower proportion of TANF child care spending in total TANF spending than those with a lower percentage of Hispanic TANF recipients.*

I argue that state TANF policies would have an impact on TANF outputs; in particular, how states spend their TANF funds. States administer TANF funds applying a variety of TANF policies (or rules), and these policies shape their TANF programs, reflecting state intentions to make people behave in certain ways by implementing those policies. As a greater percentage of TANF child care spending means more state effort to facilitate employment, in other words, to discourage welfare dependency, this study expects that the design and implementation of state TANF programs that put more emphasis on work will lead to greater spending on TANF child care. Among several candidates that could be used as an indicator of states' TANF policy orientation regarding an emphasis on work, this study utilizes data on a TANF policy that indicates whether a job-search is required to be eligible for TANF in a given state. This policy reflects states' policy intentions trying to encourage participation in the job market, which should, in turn, increase state TANF spending on child care. States with this policy in place are expected to spend more on child care than their counterparts. Therefore, this study posits the following hypothesis:

> ***Hypothesis 6***: *On average, states that require a job-search to be eligible for TANF will spend a higher proportion of TANF on child care than states that do not require a job-search.*

Meanwhile, I expect that there is an interaction between the job-search rule and female legislators. Depending on assumptions I make on how women legislators would perceive the job-search rule, I posit two contradictory hypotheses. On the one hand, women legislators might think the job-search rule as a policy design that increases the demand for child care by emphasizing work, so they would exert more influence to increase spending on child care in the presence of such a rule. In this scenario, the presence of job-search rule reinforces the effect of female legislators; also, female legislators augment the effect of job-search rule. On the other hand, women legislators might consider the job-search rule an institutional design that naturally increases TANF spending on child care. In this case, they become relatively less attentive to supporting child care need and thus motivation to increase child care spending is weakened. Therefore, the presence of such rule would negate the effect of women legislators on TANF child care spending. In the same vein, the effect of the job-search rule should decrease when women legislator presence becomes stronger. Therefore, the two hypotheses that follows are:

Hypothesis 7-a*: On average, the impact of having a higher percentage of women legislators in states will increase when states have the job-search rule; the impact of the job-search rule will increase when there is a higher percentage of women legislators.*

Hypothesis 7-b*: On average, the impact of having a higher percentage of women legislators in states will decrease when state have the job-search rule; the impact of the job-search rule will decrease when there is a higher percentage of women legislators.*

To test these hypotheses, I use panel data in 50 states from FY 2004 to FY 2016. The following section discusses the dependent and independent variables and how I operationalize the variables for the empirical test proposed in this study.

2.4 Data and Measures

This study employs a regression analysis using panel data in 50 states for FY 2004-FY 2016 to examine the factors that influence state spending on child care under the TANF block grant. While TANF financial data is available from late 1990's, the data availability for one control variable—i.e., Child Care Development Fund (CCDF) Spending—restricts the time period of the study to start from FY 2004. I conduct the analysis including dummies for each state and year. By including state dummy variables, I assume that some invariant characteristics within the states may impact the independent and the dependent variables. We can think of state culture as an example of a time-invariant characteristic of states, with women in some states traditionally being more likely to seek employment than in other states, which likely affects the outcome variable. In addition, by including year dummies in the model, I intentionally remove the impact of certain events that influence TANF child care spending across the board in most states. For example, inclusion of year dummies controls the impact of the American Recovery and Reinvestment Act (ARRA) of 2009. Through ARRA, the federal government rendered an additional $5 billion in emergency contingency funds to states in 2009 and 2010, which increased TANF funds available for all states. Therefore, the regression coefficients presented are the estimates controlling for both state and year fixed effects. They reflect the degree of influence for each factor on the percentage of state TANF child care spending, controlling for other independent variables, unobserved national time trends, and invariant but unobserved state-specific characteristics within states.

TANF Child Care Spending is the dependent variable that measures the percentage of total federal and state TANF expenditures used for child care by each state in each fiscal year.[3] States can spend the TANF funds, which consist of federal and state funds, on 22 categories of activities, and the categories can be grouped into a higher level of categories as shown in Table 2.1.[4] In this study, I include 1) direct child care spending used with federal and state funds and 2) transfers of federal TANF funds to the Child Care Development Fund (CCDF) to measure child care spending under TANF programs. The CCDF is a primary federal fund that provides child care subsidies to low income working families. The federal government limits CCDF transfers to 30 percent of total federal TANF funds.[5] Theoretically, the measure of TANF child care spending ranges from 0 to 100, but in reality the percentages range from -13.61 to 68.72. Since states are allowed to make negative adjustment to previous expenditures, negative spending can show up in TANF financial documents (Schott, Pavetti, & Floyd, 2015). Negative spending reflects that there are changes in funding streams, funds are recovered from a program, or funds are retrieved back from the CCDF to TANF (CBPP, n.d.).

The results presented in the main text are from the data set that treats negative values as they are.[6] Assuming that there could be mistakes in data entry by administrative staff (of state, federal offices, or both), I winsorize and truncate extreme values of the dependent variable at 1 and 99 percentiles respectively to reduce the effect of possible

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[3] The data for this measure are from the Center on Budget and Policy Priorities (CBPP) (CBPP, 2015) and the Department of Health and Human Services (HHS). The CBPP categorizes the TANF expenditure data into a set of sub-categories using the data collected by the Department of Health and Human Services (HHS) and released through the Office of Family Assistance (OFA) website. The OFA is one of the offices in the Administration for Children and Families that administers TANF programs.

[4] State governments are required to submit a Form ACF-196 to the U.S. Department of Health and Human Services each year on which they report how they spent the TANF block grant in these 22 categories of spending.

[5] A state can transfer federal TANF funds to Social Security Block Grant (SSBG) up to 10 percent of its TANF funds. However, CCDF transfer together with SSBG transfer may not exceed 30 percent of a states' current year block grant.

[6] The panel data include five observations that have negative values for *TANF Child Care Spending* for Arizona, Colorado (twice), Georgia, and South Dakota, in four different years from FY 2006 to FY 2014.

Table 2.1 Categories of TANF Spending

<table>
<tr><th colspan="2">Federal Reporting Category [a]</th><th>Authors' Category</th></tr>
<tr><td colspan="2">Basic Assistance</td><td>Basic Assistance</td></tr>
<tr><td rowspan="2">Child Care [b]</td><td>Assistance</td><td rowspan="3">Child Care (Spent or Transferred)</td></tr>
<tr><td>Non-Assistance</td></tr>
<tr><td colspan="2">Transferred to CCDF</td></tr>
<tr><td colspan="2">Transportation and Other Supportive Services</td><td rowspan="7">Work-Related Activities & Supports</td></tr>
<tr><td rowspan="3">Work Related Activities/Expenses</td><td>Work Subsidies</td></tr>
<tr><td>Education and Training</td></tr>
<tr><td>Other Work Activities/Expenses</td></tr>
<tr><td rowspan="2">Transportation</td><td>Job Access</td></tr>
<tr><td>Other Transportation</td></tr>
<tr><td colspan="2">Individual Development Accounts</td></tr>
<tr><td colspan="2">Refundable Earned Income Tax Credit</td><td rowspan="2">Refundable Tax Credit</td></tr>
<tr><td colspan="2">Other Refundable Tax Credit</td></tr>
<tr><td rowspan="2">Authorized Solely Under Prior Law</td><td>Assistance</td><td rowspan="3">Authorized Under Prior Law & Other Non-Assistance</td></tr>
<tr><td>Non-assistance</td></tr>
<tr><td colspan="2">Other Non-Assistance</td></tr>
<tr><td colspan="2">Administration</td><td rowspan="2">Administration & Systems</td></tr>
<tr><td colspan="2">Systems</td></tr>
<tr><td colspan="2">Prevention of Out of Wedlock Pregnancies</td><td rowspan="2">Prevention of Out of Wedlock Pregnancies & Two-Parent Family Formation and Maintenance</td></tr>
<tr><td colspan="2">Two-Parent Family Formation and Maintenance</td></tr>
<tr><td colspan="2">Transferred to SSBG</td><td>Transferred to SSBG</td></tr>
<tr><td colspan="2">Non-Recurrent Short-Term Benefits</td><td>Non-Recurrent Short-Term Benefits</td></tr>
</table>

a. The Federal reporting category is slightly modified from FY 2015. However, since child care spending and transfer to CCDF category exist as they used to be, the change in the reporting category does not affect the way I generate child care category for the analysis.
b. All categories of spending except transferred fund to CCDF and Social Security Block Grant (SSBG) can be classified as either assistance or non-assistance spending. Child care assistance is provided to families that are not employed but participating in other work activities such as job-search, education, or training. Child care non-assistance includes child care support for families who are employed, and that provided as a non-recurrent, short-term benefit.

outliers made by chance, and discuss the results in Table A.2 in the Appendix A. To be succinct, the main findings are robust to these changes to the dependent variable.

State TANF Policy is the main independent variable that captures whether a state emphasizes work in its TANF policy design. This study uses a TANF rule that indicates whether a job-search is required either before or while their application is processed as a condition to be eligible for aid in a given state as of July of each year. The variable takes on a value of 1 if a state requires job-search, and 0 otherwise. Not only does this measure vary across states, it also varies over time as states sometimes change their TANF policies.[7]

The political factors are as follows. *Government Liberalism*: This indicates the relative liberalism of a state government. For this measure, I use Berry, Fording, Ringquist, Hanson, and Klarner's (2010) NOMINATE measure of state government ideology, which indicates how close to the left state legislators and governors stand on the ideological continuum. It ranges from 0 to 100, with larger values indicating a more liberal government ideology. *Citizen Liberalism:* This is an independent variable that measures the relative liberalism of citizens in each state. The data for this variable comes from the revised citizen ideology series of Berry, Ringquist, Fording, and Hanson's (1998) study, which covers the period 1960-2016.[8] It ranges from 0 to 100, with larger numbers reflecting a more liberal citizen ideology. *Female Legislators*: This variable indicates to what extent women are represented in state legislatures, which is measured as the percentage of seats occupied by women in the state legislatures.[9]

Socio-economic factors include three societal need variables and two racial variables. First, societal needs are measured by the following: *Unemployment Rate, Poverty Rate,* and *Unwed Birth Rate*. *Unemployment Rate*: It represents the annual

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[7] The data on this TANF rule are available from the Urban Institute website (http://anfdata.urban.org/wrd).

[8] The data are available in Richard C. Fording's personal website (https://rcfording.wordpress.com/state-ideology-data/).

[9] The data for this measure are taken from the Center for American Women and Politics' (CAWP) annual fact sheets on women in state legislatures (http://www.cawp.rutgers.edu/fact-sheet-archive-women-state-legislatures).

average percentage of people aged 16 and older in employment in each state.[10] *Poverty Rate*: This variable measures the percentage of people living under a poverty threshold defined by the Census Bureau. *Unwed Birth Rate*: It is measured as the proportion of all births born to unwed women in each state, which also captures societal needs for child care.[11] Next, I take into account *African-American Recipients* and *Hispanic Recipients* to examine the probable impact of race on state TANF child care spending. These variables measure the percentage of African-American TANF recipients and that of Hispanic TANF recipients in total TANF recipients in each state.[12]

In addition to the above predictors, this study includes the following two control variables. *TANF Caseload Change*: This variable accounts for the varying degree of increase or decrease in TANF caseloads across states and years. Studies report that states were able to save TANF funds in the years after welfare reform due to a significant drop in TANF rolls. Therefore, states are able to redirect TANF money previously spent for cash assistance to other areas, including child care (Pavetti & Schott, 2011). A study that examines transfer of TANF funds to the Social Services Block Grant (SSBG) supports this expectation (Lambright & Allard, 2004). The authors find that when states have more surpluses of TANF funds due to decreased caseloads, they are likely to transfer more TANF funds to SSBG. Altogether, these findings imply that a state with more TANF

[10] The data for this measure come from the Bureau of Labor Statistics, Local Area Unemployment Statistics. "States: Employment status of the civilian noninstitutional population, 1976 to 2014 annual averages" (https://www.bls.gov/lau/staadata.txt).

[11] The information is taken from the Kids Count Data Center (http://datacenter.kidscount.org/data). Their data on this variable are analyzed using data files from the Centers for Disease Control and Prevention, National Center for Health Statistics.

[12] The data for this measure come from TANF caseload data for each year. They are released annually through the Office of Family Assistance (OFA) website (www.acf.hhs.gov/programs/ofa/programs/tanf/data-reports).

surplus generated from reduced caseloads is also likely to spend more on child care. The variable is measured as the percentage change in the total number of TANF families in each state.[13] *CCDF Spending*: This measures states' child care commitment outside of TANF block grant. TANF families can receive child care subsidies through Child Care Development Fund (CCDF) which is the largest source of child care subsidies for low-income families. It is likely that states that spend more on CCDF programs are systematically different from those that put less resources on the programs. Therefore, I include state total expenditures on CCDF programs as a control.

Except for *State TANF Policy*, all the other independent variables are lagged by one year. As the dependent variable, *TANF Child Care Spending*, uses fiscal year data, it is more reasonable to match it with lagged independent variables. In this way, I can avoid a possibility of reverse causality. Table 2.2 shows descriptive statistics of variables estimated in this study.

Table 2.2 Descriptive Statistics of Variables for FY 2004-FY 2016

Variable	Obs	Mean	Std. Dev.	Min	Max
TANF Child Care Spending (%)	650	17.27	12.96	-13.61	68.72
State TANF Policy (0/1)	650	0.37	0.48	0	1
Female Legislators (%)	650	23.54	6.94	8.20	42.00
Citizen Liberalism (0-100)	650	51.88	15.78	13.48	94.95
Government Liberalism (0-100)	650	46.16	15.88	17.51	73.62
Unemployment Rate (%)	650	6.15	2.06	2.60	13.70
Unwed Birth Rate (%)	650	38.33	6.75	17.20	55.00
Poverty Rate (%)	650	12.84	3.25	5.40	23.10
TANF Caseload Change (%)	650	-3.30	11.10	-43.54	53.67
African-American Recipients (%)	650	33.66	25.75	0.79	85.55
Hispanic Recipients (%)	650	16.00	16.81	0.17	73.30
CCDF Spending ($1,000)	650	47,200	78,200	-28,900	1,210,000

[13] The data from the OFA website are used to construct this variable.

2.5 Results

Table 2.3 gives the empirical results from the multivariate regression analysis using the panel data covering 50 states over the fiscal years 2004-2016 with year and state dummies. Estimates from the model support some of the hypotheses. Most importantly, it shows that *State TANF Policy* and *Female Legislators* interact with each other to make differences in *TANF Child Care Spending* and the effect from the interaction is statistically significant ($p<0.01$). The presence of the job-search rule and the percentage of female legislators exert a positive, independent impact on TANF child care spending and they are also conditioned by each other as I expected. It turns out, in fact, that *State TANF Policy* and *Female Legislators* make the influence from each other less effective. Note that the coefficient for *State TANF Policy* only represents the marginal effect of the job-search rule when the percentage of female legislators is held constant at zero. Because the female legislators variable ranges approximately from 8 to 42 percent in my sample, holding this variable at zero does not reflect the real world. Therefore, in interpreting the results, we should take into account the moderating effect of *Female Legislators* on *State TANF Policy* instead of looking at the main effect of *State TANF Policy*. Similarly, the coefficient for *Female Legislators* shows the marginal effect of the percentage of female legislators when states do not have the job-search rule at all. Therefore, when we discuss the marginal effect of *Female Legislators* on TANF child care spending, the moderating effect of *State TANF Policy* on *Female Legislators* must enter our calculation (Brambor, Clark, & Golder, 2006).

Table 2.3 Determinants of State TANF Child Care Spending, FY 2004-FY 2016[14]

Variables	Expected Direction	Model
Interaction		
State TANF Policy * Female Legislators	+/−	-0.38***
		(0.13)
Government Policy		
State TANF Policy	+	8.47***
		(2.87)
Political Factors		
Female Legislators	+	0.27**
		(0.12)
Citizen Liberalism	+	0.12**
		(0.05)
Government Liberalism	+	0.09***
		(0.03)
Socio-Economic Factors		
Unemployment Rate	+/−	-0.55*
		(0.30)
Unwed Birth Rate	+	-0.16
		(0.23)
Poverty Rate	+	0.19
		(0.23)
African-American Recipients	−	0.04
		(0.11)
Hispanic Recipients	−	0.35***
		(0.11)
Controls		
TANF Caseload Change	+	-0.03
		(0.03)
CCDF Spending [a]	−	6.85e-09***
		(2.53e-09)
Constant		-0.45
		(12.46)
Observations		650
Number of State		50
Years		13
R-squared		0.84

Note: Entries are coefficients estimated from a multivariate regression model with state and year dummies. The dependent variable is the percentage of total federal and state TANF expenditures used for child care

[14] One might think that competition between a state and its neighbors could play a role here. However, including neighbors' effect measured as the average percentage of neighbors' TANF child care spending in their total TANF funds does not make much difference in the results. The coefficient of neighbors' effect is 0.0003 and it is not statistically significant even with the 10% confidence level. In addition, doing so does not add to the variance explained by the model.

plus transfers to CCDF for each state in each fiscal year. All independent variables are tested against a two-sided alternative. Except for *State TANF Policy* variable, all the other independent variables are lagged by one year. Robust standard errors are in parentheses. ***p<0.01, ** p<0.05, *p<0.10
a. The coefficient for *CCDF Spending* is statistically significant at the 1% level, but its size is minuscule. Therefore, it is reasonable to interpret the result that *CCDF Spending* does not have a substantive marginal effect on *TANF Child Care Spending*.

To visualize how the marginal effect of *State TANF Policy* on the proportion of TANF child care spending changes at varying percentage of female legislators, I contrast in Figure 2.2 the marginal effect of *State TANF Policy* on the share of TANF child care spending at various percentage of *Female Legislators* with 95% confidence intervals. This shows what the average percentage of TANF child care spending would have been if all states had had the rule (and keeping the other variables constant at their means) versus if all states had not had the rule in place at different values of *Female Legislators*. As the percentage of female legislators increases, the marginal effect of *State TANF Policy* decreases at a rate of 0.38, meaning that 1% increase in female legislators leads to 0.38% decrease in TANF child care spending. However, the marginal effect of *State TANF Policy* is pronounced in states with either a higher or a lower level of women representation. There is a certain threshold that flips the contrast. When the percentage of female legislators are fewer than 16%, the marginal effect of *State TANF Policy* is positive and statistically different from zero ($p<0.05$); when states have more than 28% of female legislators, the marginal effect of *State TANF Policy* is negative and statistically significant (p<0.05). Having the job-search rule is associated with a 2.5% to 5.4% greater percentage of TANF child care spending when state have relatively low presence of female legislators, while it leads to a smaller share of TANF child care spending by 2.7% to 7 %.

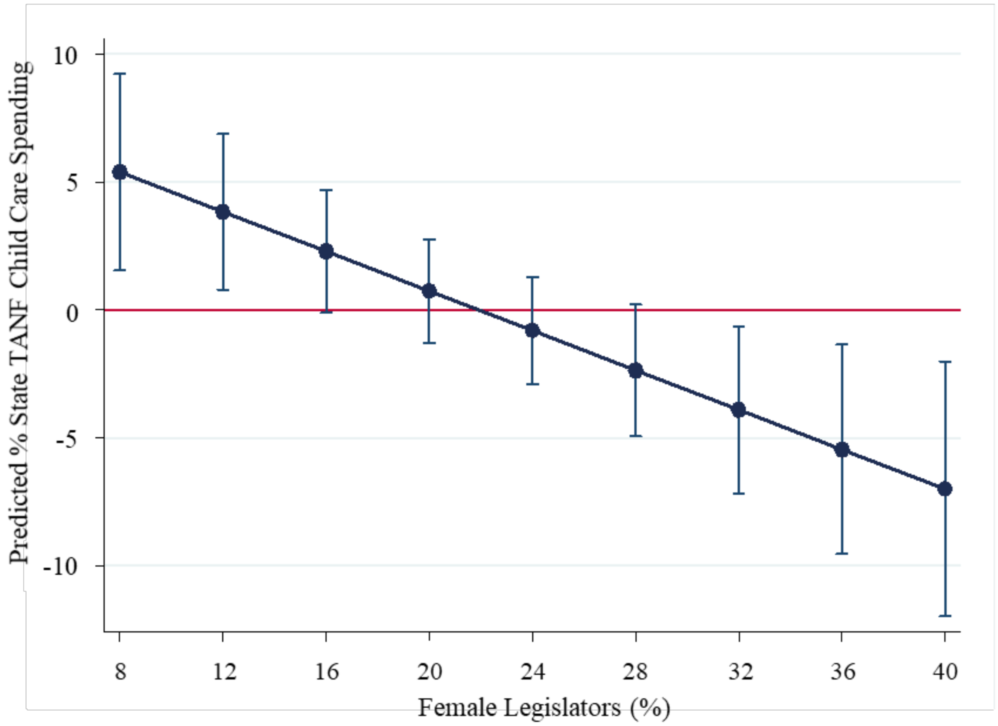

Figure 2.2 Marginal effects of state TANF policy conditional on female state legislators

Note: The X-axis shows the percentage of women legislators, and the Y-axis shows the differences in state TANF child care spending when states have a job-search rule versus when they do not have the rule (baseline). The differences are statistically significant until the 95% confidence interval line touches the zero reference line.

This empirical result suggests two interesting stories as to how *State TANF Policy* and *Female Legislators* variables interact in explaining *TANF Child Care Spending*. First, the results imply that when there is a smaller percentage of female legislators, which is under 16%, the presence of the job-search rule guarantees some level of child care spending under the TANF programs, which results in a greater percentage of child care spending than when there is no such rule in states. Second, the analysis shows that there is a certain threshold that flips the contrast. When there is a greater percentage of female legislators, which is approximately above 28%, the absence of the job-search requirement motivates women legislators to support more child care spending which is more than what states would spend when they have the job-search requirement. Spending a higher percentage of TANF fund on child care becomes feasible because there is a greater percentage of female legislators who presumably vote for more child care spending.

Figure 2.3 depicts the marginal effect of *Female Legislators* on TANF child care spending conditional on the presence of *State TANF Policy* with 95% confidence intervals. It shows that the marginal effect of *Female Legislators* is positive (β=0.27) and statistically significant (p<0.05) when *State TANF Policy* is zero, while the marginal effect is negative (β=-0.12) but statistically insignificant (p=-0.92) when *State TANF Policy* is one. This result indicates that 1% increase in female legislators increases the percentage of TANF child care spending by 0.27% when states do not have the job-search rule; however, having the job-search rule essentially makes the influence from having 1% more female legislators on state TANF child care spending close to zero. In other words, whether or not the percentage female legislators is substantively important in determining state TANF child care spending depends on whether states already have the TANF policy that potentially increases TANF spending on child care.

The result can be interpreted in the following two ways. It could be that the influence from female legislators is more effective when there is no job-search rule since the absence of the job-search requirement may motivate female legislators to support more child care spending under the TANF programs, as demonstrated by the statistically significant coefficient of *Female Legislators* (β=0.27, p<0.01). Therefore, having a higher percentage of female legislators leads to a higher percentage of spending on TANF child care when there is no job-search rule in place. In the same vein, it is likely that female legislators do not make extra efforts to support more child care spending

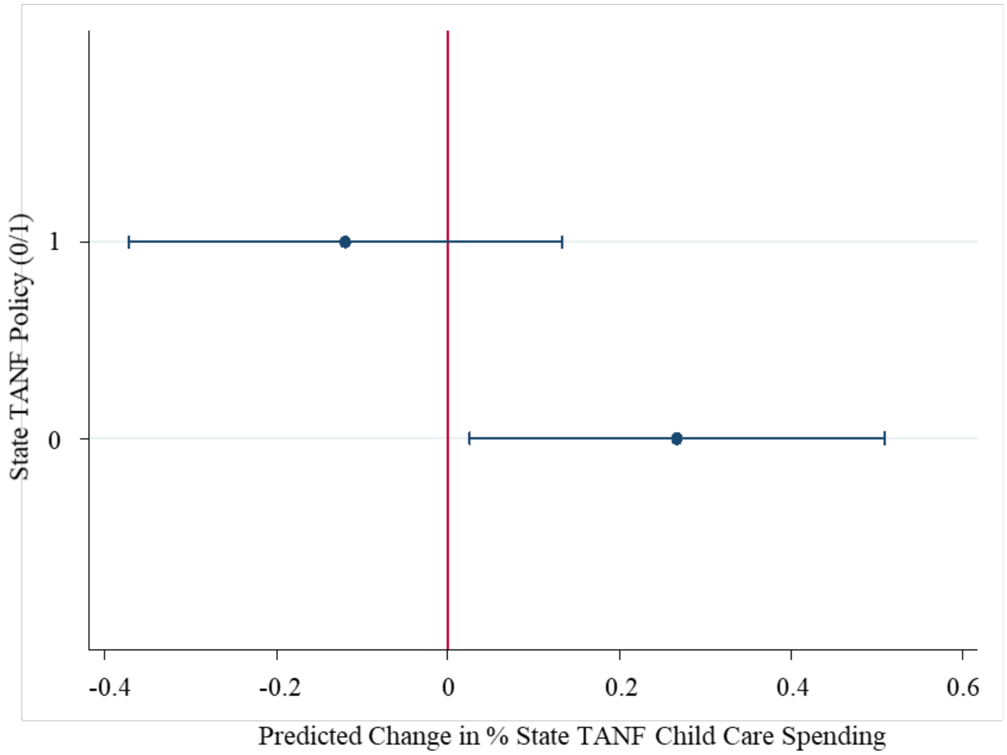

Figure 2.3 Marginal effects of female state legislators conditional on state TANF policy

Note: The Y-axis shows the presence of State TANF Policy (i.e., job-search rule), and the X-axis shows the effect of an increase in female legislators by 1% on the percentage of state TANF child care spending. The marginal effect of female legislators is statistically significant if the 95% confidence interval line does not touch the zero reference line.

acknowledging that there is a state TANF policy that is, by design, potentially associated with more state TANF spending on child care. Under the circumstances where the job-search rule is already in place, a state having 1% more female legislators does not make any difference in its TANF child care spending.

To sum, the findings suggests that *State TANF Policy* and *Female Legislators* substitute for each other in a rather interesting way. Having the TANF policy that requires recipients to search for a job leads to a greater spending on TANF child care than in the absence of such policy only when there are relatively few female legislators; up to the point where female legislators occupy 16% of state legislative seats, the marginal effect of *State TANT Policy* is positive and decreases as the percentage of female legislators increases. However, when female legislators increase beyond 28% of state legislators, the marginal effect of *State TANF Policy* becomes negative and increases as *Female Legislators* increase. It means that not having the TANF policy requiring a job-search results in a higher percentage of TANF spending on child care when the percentage of female legislators are relatively high. Meanwhile, the positive marginal impact of women's representation in state legislatures is offset by the presence of job-search rule.

Other political factors—i.e., *Citizen Liberalism* and *Government Liberalism*—turn out to be statistically significant in the expected direction. The regression coefficient of *Citizen Liberalism* is 0.12 (p<0.05), which means that as a state's citizens becomes more liberal by one point, the percentage TANF child care spending increases by 0.12% in a state. The regression coefficient of *Government Liberalism* is 0.09, which implies that as a state government becomes more liberal by one point, there is 0.09 % increase in the share of TANF child care expenditure in a state, *ceteris paribus*. Meanwhile, among the socio-economic factors, *Hispanic Recipients* is statistically significant (p<0.01) and has a positive effect as hypothesized. As a state has more Hispanic recipients of TANF by 1%, it is likely that it spends 0.35% more child care spending under TANF programs. It is important to note that none of the social need factors—i.e., Unemployment Rate, Unwed Birth Rate, and Poverty Rate—explains variation in state TANF child care spending.

2.6 Concluding Remarks

This study uses cross-sectional time-series data covering 50 states over the fiscal years 2004-2016 to examine the factors that influence the share of state spending on child care under the Temporary Assistance for Needy Families (TANF) block grant. It departs from most previous studies conducted since the welfare reform of 1996. First, this study pays attention to the nature of a block grant which renders great latitude to states to design their programs and spend money accordingly. While previous studies take advantage of the welfare reform of 1996 to investigate variations in state TANF policies and practices, including strictness/generosity and sanctions, I shift our attention to existing variations in the way states allocate and spend TANF funds, focusing on TANF child care spending, which is a timely social policy topic. Second, this study presents a mechanism through which a specific state-level TANF policy choice affects state TANF output. Many scholars have studied state TANF policy as a variable to be explained, but there has been no attempt to consider a possibility of state TANF policy having an effect on TANF outputs across states. Arguably, together with other factors, the policy intention of state governments in an attempt to shape people's behavior in certain directions is one of the important factors that predicts how states spend their TANF funds. Therefore, this study builds a theoretical framework to take into account a state TANF policy that emphasizes work to examine state TANF child care spending. As states emphasize work, they will use resources—i.e., TANF funds—to promote work. As a result, states will spend more on child care under TANF. In addition, I theorize that the state TANF policy interacts with female legislators to increase state TANF child care spending.

I show that states' emphasis on work of TANF recipients, measured by the existence of the TANF job-search rule, has a statistically significant, independent effect on the percentage of state child care spending under TANF and the effect of having the job-search rule is conditioned by the percentage of female legislators in a state. More specifically, while having the job-search rule exerts an independent effect of increasing the percentage of state TANF child care spending, the marginal effect of implementing the rule changes as the percentage of female state legislators increases. As a result, the marginal effect of the job-search rule remains positive up to the point where women legislators hold seats by 16%, but the effect becomes negative once there is more than 28% female legislators in a state.

These findings represent an important contribution to our understanding of an understudied aspect of TANF and provide directions to future studies. When states are freed to allocate and spend block grant funds under minimal federal guidelines, the way states design their policy can affect welfare recipients' experience with TANF. In addition, state policy might not be tailored to advantage people who are most vulnerable, as suggested by insignificant effects of societal need factors on TANF child care spending. Therefore, this study emphasizes the important role of states under federalism and raises a question about devolution in providing welfare. Also, the analysis suggests that future state policy research should take into account the role of state specific policies in examining policy output, especially when a policy is financed through a lump-sum money. The results show that considering states' policy intention which is presumably embedded in specific TANF policies helps understand state allocations of the TANF block grants, thereby emphasizing the importance of taking into account what rules or policies governments implement to push citizens in particular directions—which are highly likely to be in line with governments' policy goals. At the same time, however, this study highlights that such state policies can result in opposite policy output depending on states' political environments.

Although this study provides a possible explanation as to why there might be substitution between state TANF job-search rule and female state legislators on having an effect on state TANF child care provisions, further investigation is warranted to uncover why the interaction between these two factors brings about opposite results in terms of TANF child care spending when women make up a relatively high versus low proportion of state legislators. Lastly, future research that investigates how different TANF policy choices impact states' prioritization of TANF block grant and what impacts they have on recipients' well-being would broaden our understanding of TANF programs. Also, it could provide important implications for policy makers, especially when they deal with designing a policy with highly interrelated components in a single welfare program—such as employment and child care.

CHAPTER 3

MAKING SENSE OF DIFFERENT WELFARE POLICY MEASURES: HOW AND WHY DO THEY MATTER?

3.1 Introduction

What explains variation in welfare policy across American states? Since V.O. Key's (1949) seminal work, this question has been an essential part of the state welfare politics literature. Scholars have produced a tremendous amount of research while making theoretical and methodological refinements to earlier studies. Initially debating which one of two sets of factors—i.e., political vs. economic factors—is more important as determinants of state welfare policy, the literature has put much effort into finding new independent variables or interactions of two variables to better explain variation across states. Scholars also have questioned existing measures of political factors such as party control or inter-party competition (e.g., Holbrook & Van Dunk, 1993; Smith, 1997) and come up with new measures for these variables.

Despite these advances, there has been little attention to the dependent variable; that is, how different scholars define and operationalize state welfare policy. Studies have used a variety of welfare policy measures to examine factors affecting welfare policy in states, such as welfare spending per capita, the recipient rate for welfare programs, and cash benefit levels. Each study has implicitly defined welfare in different ways by including different components in welfare spending measures. However, the literature as a whole has not discussed how studies define and measure welfare policy differently and whether that matters for the findings. *Does the selection of indicators of welfare policy commitment make any difference for the findings in studies of the determinants of state* *welfare policy? If so, what difference does it make?* These questions get at the issue of whether we can generalize about welfare policy based on findings with respect to specific measures. These are the central questions I address in this paper.

To answer the above questions, I start by explaining how previous studies operationalized welfare policy in the American context and discuss how we might conceptualize welfare. Getting into an empirical section, I focus on welfare policy commitment and examine three state welfare commitment measures operationalized in different ways based on different conceptualization of welfare. The fixed effects estimation of 49 states covering the period after welfare reform shows that different factors are revealed to have influence on state welfare commitment as we use different measures of commitment. Emphasizing the importance involved in choosing a measure for a dependent variable, this study provides better grounding for future studies that examine related questions.

3.2 Studies of State Welfare Policy: Different Measures and Inconsistent Findings

As noted above, the aim of this study is to investigate consequences of using different welfare policy measures as a dependent variable. Therefore, in this section, I briefly show the kinds of state welfare policy measures scholars have examined in the literature and discuss whether they find consistent or inconsistent results in relation to key independent variables they examine depending on various dependent variable measures they use.

By and large, state welfare policy determinant studies can be grouped roughly into two categories depending on what measures of state welfare policy a study employs as a dependent variable (see Figure 3.1). One group of studies focuses on welfare

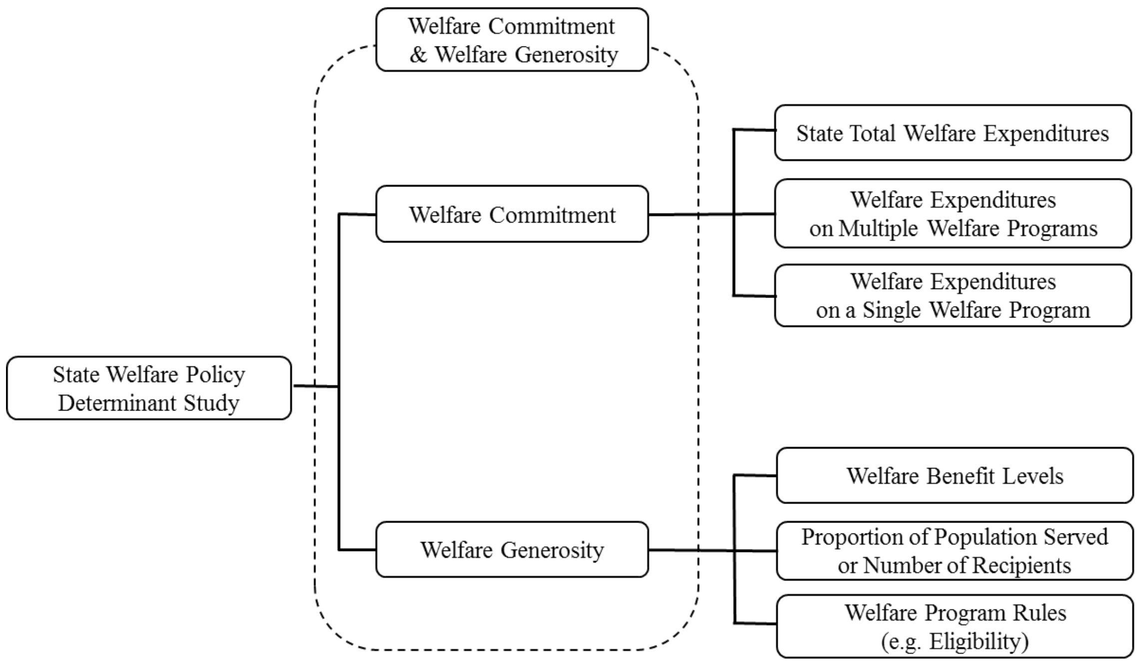

Figure 3.1 Classification of state welfare policy determinant studies

commitment, and the other group examines welfare generosity. Welfare commitment refers to the degree to which a state is willing to devote its financial resources to public welfare purposes, whereas welfare generosity indicates how well a state treats individuals or families who are recipients or potential recipients of welfare benefits. These two categories can be further distinguished within themselves in terms of what is included in welfare expenditure data and how they measure it. First, studies examining state welfare commitment use 1) state *total* welfare expenditures, 2) expenditures on *multiple* welfare programs, or 3) expenditures on a *single* welfare program. Second, state welfare generosity studies examine 1) welfare benefit levels, 2) recipient rate or number of recipients, or 3) welfare program rules (e.g., program eligibility). Unlike the studies on welfare commitment, these studies do not use an aggregate measure of welfare generosity across multiple welfare programs but focus on one particular welfare program at a time.[15] Some studies under these generosity categories examine one of these measures; others compare results from multiple generosity measures. In addition to these, a few studies address both welfare policy commitment and generosity in a single paper.

The question that follows is whether these scholars obtain consistent findings across studies using different state welfare policy measures as to what factors are important in explaining state welfare policy. Earlier studies published in the 1960s and 1970s focus on whether political or socio-economic factors better explain state welfare policy. They pay attention to political factors such as inter-party competition and party control and compare the effect of these to that of economic factors (Dawson & Robinson, 1963; Fry & Winters, 1970; Hofferbert, 1969; Sharkansky & Hofferbert, 1969; Winters, 1976). Overall, their findings are inconsistent; some show that socio-economic factors explain state welfare policy better than political factors (Dawson & Robinson, 1963; Hofferbert, 1966), while others find that political variables are more important than socio-economic variables (Fry & Winters, 1970). Also, some studies conclude that political and socio-economic variables are both important predictors of state welfare policy (Sharkansky & Hofferbert, 1969), which is the conclusion more recent studies also make (Hwang & Gray, 1991). As there exists a wide range of differences in the way each study is conducted (i.e., independent variables, time period examined, methodology), it is difficult to attribute these contradictory findings to any one aspect of study designs. However, it is apparent that dependent variables examined in these studies also vary in

[15] An exception to this is Figlio, Kolpin, and Reid (1999), which combine Aid to Families with Dependent Children (AFDC) benefit levels and Food Stamp payment levels, to test whether states compete over welfare benefits in a race to the bottom with their neighboring states.

terms of types of welfare policy measures (i.e., commitment vs. generosity), and components of the measures.

Since the late 1970s, scholars have made efforts to refine theories of political influences, and they examined not only independent effects of political variables but also their conditional and mediating effects (Barrilleaux, Holbrook, & Langer, 2002; Brown, 1995; Dye, 1984; Jennings, 1979; Ringquist, Hill, Leighley, & Hinton-Andersson, 1997). Given the wide range of differences in study design and measures of central political variables (i.e., inter-party competition and party control), these studies find fairly consistent results; political variables they examine have a conditional or a mediating effect on state welfare policy. However, again, since the dependent variables they use are so diverse, conducting an analysis using exactly the same research design but differing only in state welfare policy measures might lead to a different conclusion with regard to the impact of these political variables.

In addition to inter-party competition and partisan control of government, many scholars have examined citizen ideology as another factor influencing welfare policy, but it has been employed as a control variable rather than a main independent variable of interest in a majority of studies (Berry, Fording, & Hanson, 2003; Krueger & Mueller, 2001; Matsubayashi & Rocha, 2012). Findings from these studies are mixed; they find null effect or show evidence for partial support. However, whether scholars use welfare commitment measures or generosity measures does not make a discernible difference in these findings. Interestingly, among studies that examined state welfare expenditures per capita as a dependent variable, no study finds a significant independent effect of citizen ideology regardless of the type of citizen ideology measure employed (Krueger & Mueller, 2001; Matsubayashi & Rocha, 2012; Pacheco, 2013).

Also, scholars have examined racial factors since Wright's (1977) work on the role of race in state welfare policy making. A group of scholars examine a backlash effect of race, especially that of African-American population, and explore under what condition the effect is mediated (Barrilleaux & Bernick, 2003; Brown, 1995; Fellowes & Rowe, 2004; Matsubayashi & Rocha, 2012; Soss, Scharm, Vartania, & O'Briebn, 2001; Wright, 1977). Race is incorporated into studies using three different kinds of race variables: black population size, percentage black caseload, and racial bias in turnout. While a majority of studies find a backlash effect (Wright, 1977; Brown, 1995; Fellowes & Rowe, 2004), some show that the significance of a backlash effect depends on the state welfare policy measures examined (Barrilleaux & Bernick, 2003; Matsubayashi & Rocha, 2012; Soss et al., 2001). Barrilleaux and Bernick (2003) shows that the direction of the effect of percentage African-American is opposite when it is tested against two different state welfare policies, one for the deserving poor and the other for the undeserving poor. Also, Matsubayashi and Rocha (2012) find inconsistent results for welfare commitment and generosity measures. Altogether, the previous findings suggest that empirical findings regarding the effect of race might differ depending on which welfare policy measure a researcher examines as a dependent variable.

The review so far highlights that there are inconsistent findings with respect to the impact of various independent variables across studies. As I already mentioned, this may or may not be due to employing different measures as a dependent variable. However, a few scholars suggest that examining different measures of state welfare commitment and generosity could make differences in their empirical findings with regard to the significance of a variable under investigation (Bailey & Rom, 2004; Cnudde & McCrone, 1969; Howard, 1999; Jennings, 1979; Matsubayashi & Rocha, 2012). Therefore, it is worth testing the thesis empirically. An empirical test conducted in this paper only focuses on commitment measures of welfare policy. If results indeed change when one uses different dependent variable measures of state welfare policy to reflect differences in state welfare commitment, we have an opportunity to further examine how and why they differ across models. This can lead to refinements in theories of welfare policy. The following section describes how I construct different measures of state welfare policy commitment that are empirically tested in this paper.

3.3 Conceptualizing Welfare Policy in the U.S.

While many scholars have been eager to find explanations for variation in the level of welfare efforts and welfare spending across states (Barrilleaux et al., 2002; Fry & Winters, 1970; Jennings, 1979; Plotnick & Winters, 1985), few studies provide explanations of what welfare means and how authors define the term at the outset. Some cross-national studies provide an operational definition of welfare or welfare state, but many apply the definition that comes from the Organization for Economic Cooperation and Development (OECD) or the International Labour Organization (ILO) without explaining the choice of that definition. This is the case in studies of the American states as well. Most state-level research refers to a classification of state government finance published by the Census Bureau and do not provide proper explanation of why the categories the Census Bureau consider to be welfare constitute welfare: Researchers use those categories as welfare because the government documents classify them as welfare expenditures. Lack of discussion on this core concept becomes more problematic when scholars do not agree on the contents of the conception of welfare. For example, scholars interested in differences in welfare spending across the states might be looking at different welfare programs as a group, although these welfare programs as a group can be different in meaningful ways. Without a consensus among scholars about the definition of welfare, empirical studies conducted to explain allegedly the same phenomenon are not investigating the same thing after all. Therefore, the absence of discussion of the core concept can be a serious flaw for the literature as a whole.

Richard Titmuss, in his seminal essay on the Social Division of Welfare, seems to be one of the first scholars who opened the door for scholarly discussion on the concept of the welfare state. Titmuss (1958) believes that the welfare state provides guaranteed minimum standards of living through social services in response to changing needs of a society. According to him, those needs occur because individuals are situated in 'states of dependency' for a variety of reasons over the course of their lives (Titmuss, 1958, quote from the original author). He and his successors represent the European view of the welfare state, which emphasizes redistribution of income as one of the important objectives of the welfare state. Also, Titmuss's tradition makes it clear that social services provided by the welfare state are considered rights that a citizen could claim (Atherton, 1989). Reviewing studies of the past twenty-five years after the term "the welfare state" was first used in 1941, Schottland (1967) comes to the conclusion that scholars of both the U.S. and Western Europe generally agree that the welfare state exerts power to effect a redistribution of income by intervening in the play of market and political forces. This interpretation, which seems to be heavily based on English historian

Asa Briggs' (1961) definition of the welfare state (Schottland, 1967), further notes that promoting economic security through income maintenance programs has been the primary goal of welfare states.

Briggs provides more precise criteria for identifying the welfare state by stating that the welfare state is "a state in which organized power is deliberately used (through politics and administration) in an effort to modify the play of market forces in at least three directions" (Briggs, 1961, p. 228). These include guaranteeing a minimum income, protecting against income insecurity and vulnerability by helping people to deal with social risks, and providing *all* citizens with the *best* standards of limited social services. Meanwhile, for some, his definition is viewed as describing an ideal type of welfare state indicating what the welfare state should be (Goodin, 1982; Wedderburn, 1965). For example, Wedderburn (1965) points out that the third component—the best standards of service provision for all—of the welfare state in Briggs' definition is not accepted widely, and people rather agree that the welfare state "modifies the play of market forces in order to ensure a minimum real income for all" to some degree (Wedderburn, 1965, p. 127-8). The influence of Briggs (1961) is also found in Esping-Andersen (1983, 1990), who is famously known for his typology of welfare regimes. In *The Three Worlds of Welfare Capitalism* (1990), Esping-Andersen does not provide a clear answer to what he stressed as an important, yet neglected question in the welfare state literature--that is, "when, indeed, is a state a welfare state?" (p. 18). Instead, he introduces a common textbook definition which states that the welfare state "involves state responsibility for securing some basic modicum of welfare for its citizens" (Esping-Andersen, 1990, p. 18-19). However, his emphasis on the concept of "de-commodification" in developing the typology of the three welfare regimes tells us what he considers important in understanding the welfare state concept. According to Esping-Andersen, de-commodification is a "mainspring" of modern social policy (p. 35), which enables people "to maintain a livelihood without reliance on the market" (p. 22) through provision of social services as a matter of right. In fact, this idea of de-commodification is presented in his earlier work where he defines the welfare state. Esping-Andersen (1983) clearly stated that "the state is a welfare state when it guarantees a decent standard of living to all, as a citizen's right" (p. 28), and guaranteeing basic economic security for all citizens is one of the most important principles of the welfare state. Similar to Titmuss (1958) and Briggs (1961), he views welfare benefits as a matter of right to all citizens.

While these European scholars have stressed redistribution of income as an important objective of the welfare state more than American scholars (Atherton, 1989), what seems central in the discussion among American scholars, past and present, is that assuring economic security of people against social and economic risks is a central goal of the American welfare state. It must be reemphasized that I do not insist that redistribution is a totally neglected dimension of the American welfare state. Rather, I argue that the most important criterion by which we should judge what welfare is in the current American context is whether welfare programs attempt to ensure economic security and economic well-being of the people. The emergence and development of the welfare state in U.S. history show America has put more emphasis on protecting the people—mostly the weak—from economic insecurity stemming from unregulated market forces through welfare arrangements rather than alleviating inequality. Public assistance was first introduced in the form of public relief, and the U.S. made the first step into the modern welfare state in the 1910s with the passage of mother's pension laws to provide regular payments to needy widowed mothers (Skocpol, Abend-Wein, Howard, & Lehmann, 1993). Moreover, providing economic security is mentioned as a central goal of today's American welfare state in recent scholarly works (Garfinkel & Smeeding, 2010; Katz, 2010a; 2010b).

Katz (2010a, 2010b) is one of the few American scholars who offer a systematic definition of welfare. He defines welfare and the welfare state as "a collection of programs designed to assure economic security to all citizens by guaranteeing the fundamental necessities of life: food, shelter, medical care, protection in childhood and old age" (Katz, 2010b, p. 510). To him, protecting people from risk is fundamental to the welfare state. Similar to Katz (2010a, 2010b), Garfinkel and Smeeding (2010) emphasize that the welfare state designs institutions that reduce economic insecurity that stems from capitalism. Based on this discussion, I cast a broader net to define welfare, which is more comprehensive than that to which the public and politicians usually refer. While a minimalist definition of welfare includes only those programs targeted at the poor and often used in a pejorative sense, I define the American welfare state as a set of government programs that ensure economic security of people. "Is Program X designed to protect people from economic insecurity?" This is the very first question we can ask in sorting out welfare programs from other governmental programs.

3.4 Hypothesis

Paying attention to dependent variables and their measures is important as how studies define a core concept and operationalize measures of a dependent variable show what focal phenomenon scholars would like to explain and understand, not to mention whether they are investigating the same phenomenon. From an empirical standpoint, lack of discussion of the conception of the dependent variable—in this case, state welfare commitment—becomes more problematic when we have inconsistent findings as to what explains variation in welfare commitment across states. As shown earlier, scholars define state welfare commitment in a variety of ways. Moreover, they report inconsistent findings across studies. Inconsistent findings on the effect of various key factors provide motivation to empirically test whether the choice of a dependent variable measure really matters. What might be the consequences of examining different welfare commitment measures with regard to finding determinants of state welfare policy?

Presumably, using different conceptualizations and measures of welfare commitment is likely to produce different results in terms of what factors matter and how because different measures reflect different phenomena and these phenomena would result from different dynamics among various political, socio-economic, and demographic factors. In this study, therefore, I test a general hypothesis as follows:

> ***Hypothesis****: The choice of a state welfare commitment measure as a dependent variable results in differences in empirical results as to what factors explain variation in welfare commitment across states.*

While keeping an eye on other factors, this study pays particular attention to political factors. Support for welfare in general has been viewed as an outcome of political struggles between different political parties and citizens that have different stakes in welfare. However, depending on how we define welfare commitment and which welfare commitment measure we examine, associated politics of state welfare policy might not be identical. Details on a set of different measures of state welfare commitment are discussed in the following section.

3.5 Methods

3.5.1 Models

I empirically test the hypothesis using three models including a different measure of state welfare commitment as a dependent variable. It is difficult to attribute contradictory findings from the literature to any one aspect of studies, due to a wide range of differences in research design, variables included, and time period covered. Therefore, the key to estimating the three models is to model them as having an identical set of independent variables. The specific form of these models is as follows:

$$\boldsymbol{Y}_{s,t} = \alpha_0 + \beta_1 \boldsymbol{X}_{s,t-1} + \Sigma\mu_s D_s + \Sigma\rho_t D_t + \varepsilon_{s,t} ,$$

where $Y_{s,t}$ is a dependent variable, state welfare commitment variable for a given state s at a given year t. $\boldsymbol{X}_{s,t-1}$ is a vector of political, economic, programmatic, and demographic factors of state s at year $t-1$. D_s represents a state dummy variable, D_t indicates a year dummy variable, and $\varepsilon_{s,t}$ is a random error term.

I estimate the above fixed effects regression model including state and year dummies three times with different dependent variables—i.e., a measure of state welfare commitment—and the same set of independent variables and obtain the Least Square Dummy Variable estimators. By including dummy variables for each state, I control for unobserved time-invariant characteristics within the states which may impact the independent and the dependent variables. The year dummies remove the impact of certain events that influence state welfare spending across the board in the states. I compare the estimators obtained from each of the three models to see whether the impact of various factors on state welfare commitment changes as we examine different measures of welfare commitment.

I originally set up the models as a dynamic panel model which contains a one-year lag of the dependent variable as an independent variable with state and year fixed effects, and estimate them using the Arellano-Bond (1991) generalized method-of-moments estimator. The Arellano-Bond estimator addresses the problem of autocorrelation between the lagged variable and the residuals by allowing lagged values of the dependent variable to be included in the model as an additional independent variable. However, the three dependent variables in each model are so highly correlated individually over time that the Arellano-Bond estimators fail the test of instrument variables being uncorrelated with error terms. Therefore, I estimate fixed effects regression models without lagged dependent variables. In the Appendix B, I discuss how and why the estimators do not work by showing the results of post-estimation diagnostic tests for the Arellano-Bond estimation.

The data cover all states except for Nebraska. Because Nebraska has a non-partisan state legislature, the data on some political variables are not available for the state. The studied period is FY 1999 to FY 2010. I choose FY 1999 as the beginning year of the analysis because not all the provisions and amendments in PRWORA became immediately effective when the law was adopted in August, 1996. For example, the PRWORA required states to implement Temporary Assistance for Needy Families (TANF) by July 1, 1997, allowing about a year for states to plan and adjust their policies (Personal Responsibility and Work Opportunity Reconciliation Act of 1996, 1996). Therefore, I deem more appropriate to assume that there was some delay in timing for the welfare reform to have influence on state welfare policies. Since state welfare commitment data are fiscal year data, I use a one-year lag for all of the independent variables that use calendar year data. Policy decisions are usually made during earlier months of a calendar year, so it makes sense to match data in this way. It is not unlikely that Federal aid variables that use fiscal year data have a contemporaneous effect on state welfare commitment, but due to endogeneity concerns, I lag these variables by one year. I adjust all dollar terms using the state Consumer Price Index developed by Carrillo, Early, and Olsen (2014).

3.5.2 Dependent Variables: State Welfare Commitment Measures

State welfare commitment refers to the degree to which a state is willing to devote its financial resources for public welfare purposes, which is measured as the log of per capita state welfare expenditures.[16] In this paper, I exploit three measures of state welfare commitment based on different conceptualizations of welfare to test whether choosing one measure over the others make any difference in the estimation results. First, I use the U.S. Census Bureau's definition of welfare spending that determines the Census measure. While the Census Bureau does not provide a definition of welfare *per se*, we can infer it by looking at what categories of spending are reported under a relevant category in the Census's State Government Finance database. Many previous studies refer to a classification of state government finance document published by the Census Bureau and analyze data that are reported under the 'Public Welfare' category in the Census database

[16] Previous studies use either state welfare expenditures or state and local welfare expenditures as a dependent variable to examine determinants of state welfare commitment (e.g., Gilligan & Matsusaka, 1995; Hill & Leighly, 1992; Jennings, 1979; Matsubayashi & Rocha, 2012; Pacheco, 2013). It seems that there is no consensus as to whether we should combine welfare expenditures spent by localities into a measure of state welfare commitment to examine determinants of state welfare commitment. In this paper, I use direct welfare expenditures from states only.

(U.S. Census, 2006).[17] Under the Census classification, state welfare expenditures consist of expenditures associated with Supplemental Security Income (SSI), TANF, Medicaid, other cash assistance programs that give cash directly to individuals contingent upon their need, payments to private vendors providing welfare services including medical care, provision, construction, and maintenance of welfare institutions, and other welfare activities not classified elsewhere, such as children services (U.S. Census, 2006). By looking at what the Census database includes as public welfare, it is quite clear that what the Census Bureau categorizes as public welfare programs are those targeted at the poor and often used in a pejorative sense, although SSI and Medicaid may be viewed somewhat differently. Therefore, I first estimate Model 1 which employs a measure of state welfare expenditures as shown in the Census public welfare category (Census measure).

Second, I construct a more comprehensive measure of state welfare commitment based on a broader concept of welfare state (Comprehensive measure 1). As suggested earlier, I conceptualize the American welfare state as a set of government programs that ensure economic security of people. By definition, this conception of welfare incorporates various aspects of social policy, including Unemployment Insurance, Workers' Compensation, and public education, which is more comprehensive than the Census Bureau's implied definition of welfare. Therefore, to construct the second measure of state welfare commitment reflecting this broader concept, I cast a broader net to add a series of spending data to the Census welfare expenditure data. Most importantly, the Census database does not include expenditures on Unemployment

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[17] These studies include Hwang and Gray (1991), Gilligan and Matsusaka (1995), Krueger and Muller (2001), Matsubayashi and Rocha (2012), and Radcliff and Saiz (1995).

Insurance, Workers' Compensation, and public education under the public welfare category. While Unemployment Insurance provides economic assistance to unemployed workers who lost their jobs through no fault of their own, such as layoffs or retrenchment, Workers' Compensation provides wage replacement and medical benefits to employees injured while in their work. Not only are both programs part of the upper tier of the American welfare state (Howard 1999), but they also meet the comprehensive definition of welfare discussed above.

Unlike these two welfare policies having been recognized as a part of the policy package of the welfare state, public education has largely been dismissed and viewed as different by many welfare state scholars (e.g., Wilensky, 1975). At the same time, however, some scholars such as Esping-Andersen (1990) acknowledge that education is one of the salient parts of the welfare state, and more and more studies have scrutinized public education in relation to other social policies (Hega & Hokenmaier, 2002; Iversen & Stephens, 2008; Nikolai, 2011). Also, there are scholars who explicitly state that public education should be seen as a part of American welfare state. Public education served as an Ersatz welfare state in the U.S. (Heidenheimer, 1981) and must be viewed as "a central component of the American notion of welfare," according to Janowitz (1976, p. 34-5). More recently, public education has been recognized as a part of the American welfare state by scholars who emphasize the provision of economic security as central in understanding the American welfare state (Garfinkel & Smeeding, 2010; Katz, 2010a; 2010b). Education policy is different from other welfare policies in that provision of education indirectly reduces economic insecurity by helping people raise their capability to deal with economically difficult situations (Garfinkel & Smeeding, 2010); it provides social protection through social investment. Also, public education is available to all citizens; there is no restriction as to who can benefit, unlike other welfare programs. Following this recent scholarship, thus, considering public education as a welfare program is appropriate. I separate out expenditures on these programs that are placed under different Census functional categories and combine them with the first measure—i.e., the Census measure— to create the second measure—i.e., Comprehensive measure 1—and estimate Model 2.

Lastly, I use a state welfare commitment measure subtracting public education spending from the Comprehensive measure 1 in Model 3—i.e., Comprehensive measure 2. Although I argue that public education can be considered a part of welfare, some might still be reluctant to combine public education with other traditional public assistance and social security in examining state welfare commitment. It is different from other welfare programs I list above in that education focuses on equality of opportunity rather than equality of condition (Castles, 1989, p. 431), and it is universally available to all who want to use it. Also, it is future-oriented in that it benefits people in their future by strengthening their ability to cope with economic difficulties that they will face in the future. Table 3.1 provides information on the measure of state welfare policy commitment used in each model.

3.5.3 Independent Variables

POLITICAL FACTORS. Scholars have paid attention to political forces that might influence state commitment to welfare. Sparked by the V. O. Key's (1949) seminal work on Southern politics, earlier studies in the literature question whether political or economic factors better explain variation in state welfare policy (Cnudde & McCrone, 1969; Dawson & Robinson, 1963; Fry & Winters, 1970; Hofferbert, 1966; Sharkansky & Hofferbert, 1969). These studies focus on inter-party competition, party control, and political variables as a group and compare the impact of those relative to that of socio-economic variables. In the current study, I examine (1) *Unified Democrat Control*, (2) *Unified Republican Control*, (3) *Inter-Party Competition*, (4) *Electoral Competition*, (5) *Government Liberalism*, and (6) *Citizen Liberalism* as political factors in the baseline model.

Table 3.1 Measures and Measurements of State Welfare Commitment in Three Models

Model	Measure	Measurement
Model 1	Census measure	Log of per capita state total welfare expenditures, reported under *a public welfare category in the Census database*. They include state expenditures associated with Supplemental Security Income, Temporary Assistance for Needy Families (TANF), Medicaid, other cash assistance programs that give cash directly to individuals contingent upon their need, payments to private vendors providing welfare services including medical care, provision, construction, and maintenance of welfare institutions, and other welfare activities not classified elsewhere such as children services.
Model 2	Comprehensive measure 1	Log of per capita state total welfare expenditures, reported under a public welfare category in the Census database *plus state spending on Unemployment Insurance, Workers' Compensation, and public education (elementary and secondary).*
Model 3	Comprehensive measure 2	Log of per capita state total welfare expenditures, reported under a public welfare category in the Census database *plus state spending on Unemployment Insurance and Workers' Compensation.*

Note: Differences across measures compared to the Census measure are highlighted in *italics*.

(1) *Unified Democrat Control*. This variable indicates whether all branches of a state government are controlled by Democrats. If Democrats control both state

legislatures and governorship, the variable takes a value of one, and otherwise zero. While previous studies find mixed results on the effect of Democratic control on state welfare commitment, there is evidence that Democrats are more likely to support welfare than Republicans (Hwang & Gray, 1991) and that unified Republican control leads to lower state spending on welfare (Gilligan & Matsusaka, 1995).

(2) *Unified Republican Control*. This indicates whether both state legislatures and governorship are controlled by Republicans. If Republicans control all branches of a state government, the variable takes a value of one, and otherwise zero. Including a separate dummy variable for full Republican control makes it easier to interpret the results.

Scholars have employed different ways of measuring partisan control. For example, Matsubayashi and Rocha (2012) separate party control measures for governorship and legislatures. This way of measuring partisan control would be suitable if a researcher is more interested in the effect of governor and legislators separately. However, since both executive and legislative branches need to endorse a bill to realize a policy, it is more appropriate to combine both branches in a single measure if one would like to test whether either party controlling a state government matters. Meanwhile, other scholars examine legislative partisan composition (or party strength) from Smith (1997) instead of or together with partisan control, either using a number (Gilligan & Matsusaka, 1995) or a percentage of seats held by Democrats in state legislatures (Barrilleaux et al., 2002; Krueger & Muller, 2001). These studies ignore the power that governors might exert in policy processes. A party strength measure assumes linearity in changes, so even though these studies hypothetically take into account governors' power by adding a governorship variable as an additional control, for example, an interpretation of it is less relevant to what this study tries to explain than the categorical measure this study employs. Since there is empirical evidence that Democrats behave differently from Republicans as a group in supporting welfare (Gilligan & Matsusaka, 1995; Hwang & Gray, 1991), this study is interested in whether the difference is observed, if any, as a function of discrete change in party control when we apply different measures of welfare commitment. Whether Democrats or Republicans holding seats by one more percent or one more seat in the legislatures makes a difference in terms of welfare policy is of less interest in this study.

(3) *Inter-Party Competition*. This variable measures the degree of party control of, and competition between two parties for control of, a state government (Hill, 2003). This study uses the "folded" Ranney (1976) index that utilizes the partisan composition of state legislatures, the vote share for the parties' gubernatorial candidates, and the percentage of time that the parties held both the governorship and a majority in the state legislature. The index ranges from 0.5 to 1, 0.5 denoting one party dominance and 1 indicating perfect competition between the two parties. Using this measure (unfolded version), Cnudde and McCrone (1969) shows that the effect of inter-party competition on change in spending of several welfare policies varies depending on what policy one examines, while Flavin (2015) does not find that inter-party competition is an important factor in explaining the share of state welfare spending in total state expenditures. Meanwhile, using a measure very similar to Ranney's classification, Dye (1984) finds that competition within states does not ensure increases in state welfare expenditures under Democratic control. Utilizing only the data on the percentage of seats held by

Democrats, Preuhs (2007) shows that her measure of political competition does not explain different indicators of the welfare state.

(4) *Electoral Competition*. This variable measures the degree of competitiveness of district-level state legislative elections. This study employs Holbrook and Van Dunk's (1993) measure that uses information on vote for winners, the margin of victory, uncontested seats, and safe seats. Scholars have often used the Ranney index and Holbrook and Van Dunk's measure interchangeably to measure inter-party competition partly because they highly and positively correlate to each other for some period of time in the past (Shufeldt & Flavin, 2012). However, the two measures are conceptually very different (Barrilleaux et al., 2002; Hill, 2003; Shufeldt & Flavin, 2012) and do not have a positive correlation any more (Shufeldt & Flavin, 2012). While Ranney's measure also uses election results (but only that of gubernatorial elections), it focuses more on the extent to which parties compete for control of state government. On the contrary, Holbrook and Van Dunk's measure of electoral competition gives more weight to the extent to which the parties are competitive in individual state legislative elections. Using Holbrook and Van Dunk's measure, Barrilleaux et al. (2002) finds that the effect of electoral competition depends on party control of the legislature, and Soss et al. (2001) shows that a state with more competitive elections is likely to have more generous TANF policy.

Interestingly, these two groups of studies using a different measure of party competition both are inspired by V. O. Key's central thesis regarding inter-party competition (Key, 1949), but use theoretically different concepts of party competition. I view that electoral competition is closer to what V. O. Key (1949) tries to say when he argues that inter-party competition leads policy to be more oriented to the "have-nots" in society because competition serves as a mechanism that enables the have-nots to promote their preferences as parties compete for votes. However, as studies examining state welfare politics employ either the Ranney index or Holbrook and Van Dunk's measure and empirical results are not consistent even within each group of studies, I test whether they both have impact on each of the dependent variables by including these two together in a single equation. Because these two measures of party competition are both theoretically and empirically different, including both in the same model does not cause a problem (Shufeldt & Flavin, 2012).

(5) *Government Liberalism.* This variable indicates the relative liberalism of a state government, i.e., how close to the left state legislators and governors stand on the ideological continuum. For this measure, I use Berry, Fording, Ringquist, Hanson, and Klarner's (2010) NOMINATE measure of state government ideology, which ranges from 0 to 100, with larger numbers reflecting a more liberal government ideology. While the findings are mixed, there is empirical evidence that states with more liberal governments spend more money on welfare and have less restrictive benefit eligibility rules (Berry, Ringquist, Fording, & Hanson, 1998; Rom, 1999; Soss et al., 2001).

(6) *Citizen Liberalism.* This variable measures the relative liberalism of citizens in each state. The data for this variable comes from an updated version of Berry et al.'s (1998) study of the measure of citizen and government ideology in the American states, which covers the period 1960-2013. It ranges from 0 to 100, with larger numbers reflecting a more liberal citizen ideology. While some studies show no statistically significant effect of citizen liberalism on total state welfare commitment (Krueger & Muller, 2001; Matsubayashi & Rocha, 2012; Pacheco, 2013), others find that a state with

more liberal citizens tends to adopt more generous welfare policy (Barrilleaux & Bernick, 2003; Ringquist et al., 1997; Reingold & Smith, 2012).

ECONOMIC FACTORS. Economic factors are widely examined determinants of state welfare expenditure levels. Some earlier studies conclude that the effect of inter-party competition is spurious and in fact economic forces are more important than political forces (Dawson & Robinson, 1963; Hofferbert, 1966). However, other studies have shown that economic factors are not substitutes but complements to political factors (Hwang & Gray, 1991; Sharkansky & Hofferbert, 1969). Therefore, this study examines (1) *Income* and (2) *Unemployment* as economic indicators.

(1) *Income.* This variable indicates fiscal capacity of a state, measured as log of per capita state personal income. While previous studies show somewhat mixed findings, many studies find that states with greater fiscal capacity have higher state welfare spending. (Hill & Leighly, 1992; Hwang & Gray, 1991; Krueger & Muller, 2002; Radcliff & Saiz, 1995).

(2) *Unemployment.* As a popular measure denoting an economic condition of a state, this variable is measured as the percentage of state labor force who are unemployed. Since this variable shows how well a state is doing economically, thereby indicating demands for welfare, it is expected that a higher unemployment rate leads to higher welfare spending in a state (Flavin, 2015).

PROGRAMMATIC FACTOR. Third, this study includes a programmatic factor that is found to affect state welfare commitment, which is *Federal Aid*.

Federal Aid. This variable is measured as log of per capita total federal aid transferred to a state. Some welfare programs such as Medicaid and Child Care

Development Block Grant Program require states to match federal funds. Therefore, there would be effects of matching federal grants, which will positively influence state total welfare commitment as the amount of federal aid increases (Barrilleaux et al., 2002; Gilligan & Matsusaka, 1995; Matsubayashi & Rocha, 2012).

DEMOGRAPHIC FACTORS. Lastly, this study estimates the effects of various demographic factors: (1) *African-American*, (2) *Hispanic*, (3) *Poverty*, and (4) *Elderly*. These variables account for demands for welfare and different attitudes toward welfare.

(1) *African-American.* This variable measures the proportion of state population that is African-American. Many studies hypothesize that there is a backlash effect when black population constitutes a large proportion of the society and find evidence of racism as an explanation for state welfare policy choices, including welfare spending levels (Barrilleaux & Bernick, 2003; Brown, 1995; Fellowes & Rowe, 2004; Matsubayashi & Rocha, 2012; Soss et al., 2001; Wright, 1977).

(2) *Hispanic.* Similar to the above variable, this variable indicates to what extent a state consists of the Hispanic population. It is measured as the percentage of state population that is Hispanic. Some studies find that a state with larger Hispanic populations is likely to spend less on welfare (Flavin, 2015; Matsubayashi & Rocha, 2012). Together with African-American variable, this variable can show whether there is a racial effect on state welfare commitment.

(3) *Poverty.* This variable shows the percentage of state population living below the federal poverty level. Welfare programs incur costs when there are a greater number of poor people as the poor are the main recipients of welfare benefits and services.

Reflecting demands for welfare, this variable is expected to have a positive relationship with state welfare commitment.

(4) *Elderly.* This variable measures the percentage of state population who are 65 years old and above. The proportion of the elderly is often studied in Medicaid or other health policies. However, given that senior citizens are politically more active in participating in elections and that they support more spending on welfare (Howard, 2007), the percentage of this population could have an impact on welfare spending of a state.

Table 3.2 below shows the descriptive statistics of variables used in the models. Details on the dependent and independent variable measures and sources of the data are summarized in Table B.2 in the Appendix B.

Table 3.2 Descriptive Statistics of Variables for FY 1999-FY 2010

Variable	Unit	Obs	Mean	S.D	Min	Max
State Welfare Commitment 1 (Model 1)	Log, $	588	7.03	0.31	5.76	7.80
State Welfare Commitment 2 (Model 2)	Log, $	588	7.21	0.34	6.02	8.17
State Welfare Commitment 3 (Model 3)	Log, $	588	7.18	0.31	6.00	8.00
Unified Democrat Control	0/1	588	0.27	0.45	0	1
Unified Republican Control	0/1	588	0.26	0.44	0	1
Inter-Party Competition	0.5-1	588	0.88	0.09	0.64	1.00
Electoral Competition	0-100	588	38.71	11.05	12.05	63.10
Government Liberalism	0-100	588	47.83	13.70	17.56	73.62
Citizen Liberalism	0-100	588	52.58	15.63	8.45	95.97
Income	Log, $	588	10.54	0.16	10.21	11.04
Unemployment	%	588	5.06	1.61	2.3	13.7
Federal Aid 1 (Model 1)	Log, $	588	6.61	0.34	5.63	7.46
Federal Aid 2 (Model 2)	Log, $	588	6.91	0.29	6.02	7.65
Federal Aid 3 (Model 3)	Log, $	588	6.63	0.33	5.72	7.47
Elderly	%	588	12.65	1.80	5.27	18.03
African-American	%	588	10.50	9.60	0.31	37.08
Hispanic	%	588	8.88	9.39	0.54	46.03
Poverty	%	588	11.91	3.14	4.5	23.1

Note: The statistics are for 49 states excluding Nebraska. All independent variables are lagged by one year.

3.6 Results

Table 3.3 gives the empirical results from the regression analysis using the panel data covering 49 states over FY 1999-FY 2010 with year and state fixed effects. Each model employs a different dependent variable measure, but the included independent variables are exactly the same across the three models. At first glance, it is apparent that the statistical significance and the magnitude of a few coefficients are not similar across the three models, especially when Model 1 with the conventional measure of state welfare commitment is compared with the other two models using the comprehensive measures. While *Federal Aid* is strongly associated with state welfare commitment across all three models ($p<0.01$), the results from *Unified Democrat Control*, *Inter-Party Competition*, *Government Liberalism*, *Income*, *Unemployment*, and *Hispanic* variables are different depending on the measure of welfare commitment employed. Among political variables, the effect of *Unified Democrat Control* becomes statistically different from zero ($p<0.10$) when I depart from using the narrowly defined measure of welfare commitment; it is significant in Model 2 and Model 3 but not in Model 1. Similarly, *Government Liberalism* is significant at the 1% significance level in Model 1 but only at the 10% level in the other two models, while *Inter-Party Competition* is significant at the 5% level of significance in Model 2 but only at the 10% level in Model 1 and Model 3. Also, the difference between the magnitude of its coefficients seems to be relatively large across the models. The coefficients of *Inter-Party Competition* show that as inter-party competition in a state becomes more competitive by a 0.1 point, state welfare commitment increases by 1.9% in Model 1, 3% in Model 2, and 2.4% in Model 3. While none of the economic variables explain state welfare commitment when welfare is

Table 3.3 Determinants of State Welfare Commitment from Three Models with Different Dependent Variable Measures, FY 1999-FY 2010

Model (DV Measure) / Independent Variables	Model 1 (Census Measure)	Model 2 (Comprehensive Measure 1)	Model 3 (Comprehensive Measure 2)
Unified Democrat Control (0/1)	2.80 (2.33)	4.53* (2.32)	4.40* (2.35)
Unified Republican Control (0/1)	<0.0001 (2.71)	-0.45 (2.98)	-0.98 (2.78)
Inter-Party Competition (0.5-1)	18.6* (10.6)	30.2** (13.1)	23.7* (12.2)
Electoral Competition (0-100)	0.13 (0.20)	-0.08 (0.21)	-0.02 (0.21)
Government Liberalism (0-100)	0.21*** (0.07)	0.20* (0.11)	0.17* (0.10)
Citizen Liberalism (0-100)	0.13 (0.11)	0.10 (0.11)	0.12 (0.11)
Income (log, $)	0.57 (0.41)	0.68* (0.38)	0.64 (0.39)
Unemployment (%)	-0.04 (1.03)	2.36** (1.05)	2.60** (1.06)
Federal Aid (log, $)	0.34*** (0.06)	0.34*** (0.07)	0.29*** (0.05)
Elderly (%)	2.32 (3.47)	2.92 (3.04)	2.94 (2.95)
African-American (%)	1.24 (3.37)	1.47 (3.25)	1.59 (2.91)
Hispanic (%)	3.12* (1.71)	4.19** (1.75)	4.32** (1.73)
Poverty (%)	0.43 (0.41)	0.50 (0.42)	0.46 (0.43)
Constant	-2.51 (4.11)	-3.89 (3.94)	-3.09 (4.01)
Observations	588	588	588
Number of states	49	49	49
R-squared	0.92	0.94	0.93

Note: Entries of coefficients are fixed effect estimates from a panel data model with state and year dummy variables. The dependent variable in each model is log of per capita state total welfare expenditures in each fiscal year. All independent variables are lagged by one year and tested against a two-sided alternative. Clustered standard errors are in parentheses. ***p<0.01, ** p<0.05, *p<0.10

a. The coefficients and standard errors of all independent variables except for those using dollar as a unit are presented after multiplying each original regression output by 100 for ease of interpretation.

b. Nebraska is excluded because it has a non-partisan state legislature.

narrowly defined, *Income* predicts welfare commitment in Model 2 ($p<0.10$), and *Unemployment* predicts welfare commitment in Model 2 and Model 3($p<0.05$). Among demographic variables, *Hispanic* is associated with state welfare commitment no matter how it is measured, but its effect is detected at the 5% significant level in Model 2 and Model 3 ($p<0.05$) in comparison to the 10% significance level in Model 1. Overall, these findings suggest that the choice of dependent variable in the analysis could change the way we understand state welfare policy making. A study that employs the narrowest measure of state welfare commitment—i.e., Census Measure—would conclude that *Unified Democrat Control*, *Income*, and *Unemployment* do not have statistically significant influence on state welfare commitment, whereas one using the broadest measure—i.e., Comprehensive Measure 1—would find those variables to be important in explaining state welfare spending. Similarly, a researcher using the welfare commitment measure that is conventionally used would be more convinced that *Government Liberalism* is a good predictor of state commitment compared to one who uses a broader measure of welfare commitment.

The results shown in Table 3.3 is the key that highlights the consequences of choosing one dependent variable measure over others. However, I investigate further to see to what extent the results across the three models are substantively different using the regression output reported in the table. This is particularly important for interpreting and grasping the meaning of coefficients of political variables since those variables are index variables which are not easy to interpret. Table 3.4 shows the predicted influence of independent variables on state welfare commitment in the three models. More specifically, I obtain predicted change in state welfare commitment when an independent variable increases by one standard deviation (henceforth, s.d.) from the mean. Effects of independent variables are reported only for those whose coefficients are statistically different from zero at the 10% significance level or less at least in one of the three models. Since the dependent variables are entered as a logarithmic form in the models, I calculate the predicted change using levels of state welfare spending per capita.

Table 3.4 Predicted Influence on State Welfare Commitment Across Models

Predicted Change in Dependent Variable Brought About by Moving Independent Variable One Standard Deviation Above Mean			
	Model 1 (Census Measure)	Model 2 (Comprehensive Measure 1)	Model3 (Comprehensive Measure 2)
Unified Democrat Control	n/a	2.04% more ($28 more per capita)	1.99% more ($26 more per capita)
Inter-Party Competition	1.62% more ($18 more per capita)	2.64% more ($36 more per capita)	2.07% more ($27 more per capita)
Government Liberalism	2.84 % more ($32 more per capita)	2.76% more ($37 more per capita)	2.34% more ($31 more per capita)
Income	n/a	11.30 % more ($153 more per capita)	n/a
Unemployment	n/a	3.87% more ($52 more per capita)	4.28% more ($56 more per capita)
Federal Aid	12.14% more ($137 more per capita)	10.19% more ($138 more per capita)	17.95% more ($236 more per capita)
Hispanic	33.97% more ($383 more per capita)	48.24% more ($653 more per capita)	50% more ($658 more per capita)

Note: Individual effects are only reported for variables whose coefficient is statistically significant at the 10% significance level or less at least in one model. They represent the predicted change in the dependent variables, holding all other variables at their mean. In calculating the change, I undo log transformation of the predicted value of dependent variables so that interpretation of the predicted change can be made toward levels. n/a: Not applicable.

The estimates show that the effect of moving independent variable by one s.d. above the mean is greatest when the *Hispanic* variable changes. Depending on the model, states where the proportion of Hispanic is one s.d. above the mean are predicted to spend 34% to 50% more on welfare than the average states. Moving *Federal Aid* one s.d. from the mean exerts the second largest influence on the change in state welfare commitment, predicted to increase state welfare commitment by 10.2% to 18% compared to the average states depending on the model examined. A state with *Income* one s.d. above the mean tends to spend 11.3% more on welfare than the average when the broadest measure of welfare commitment is considered, while an increase in *Unemployment* by one s.d. from the mean is related to 3.9% and 4.3% more welfare spending in Model 2 and Model 3, respectively. Compared to these variables, one s.d. increase in political variables has weaker influence on the change in state welfare commitment. Increasing these variables by one s.d. from the mean leads to a raise in state welfare commitment by 1.6% to 2.8%. Despite relatively small impact of political variables on state welfare commitment, it is important to note that they have differential effects across models. Again, it is possible that one can reach to different conclusion as to what matters for state welfare commitment depending on the choice of welfare commitment indicators.

As a further examination, I conduct a test on the equality of coefficients across the models using seemingly unrelated regression (Zellner, 1962). The test results indicate whether the coefficients of each independent variable across the models are statistically different from each other. I test the equality jointly across the three models (i.e., F-test) and between two models paired differently (i.e., t-test). Table 3.5 shows the p-values resulting from the equality tests. Variables in bold indicate those that are shown as statistically significant at the 10% level or less in at least one of the three models in Table 3.3. As shown in the second column of the table, the coefficients of five variables—i.e., *Unified Democrat Control*, *Electoral Competition*, *Unemployment*, *Federal Aid*, and *Hispanic*—are significantly different across the three models at different level of significance although *Electoral Competition* is not a statistically significant predictor in all three models as reported in Table 3.3. The results shown in the last three columns suggest that the differences in the coefficients of these variables are mostly derived from the fact that the coefficients in Model 1 and Model 2 are different and those in Model 1 and Model 3 are different. These variables exert significantly different influence on state welfare commitment when I compare Model 1 with Model 2 or Model 1 with Model 3 ($p<0.05$ or $p<0.01$). Meanwhile, the effect of *Inter-Party Competition* is significantly different between Model 1 and Model 2 ($p>0.10$) although it is not different when all three models are jointly taken into account.

Table 3.5 Equality of the Coefficients of Independent Variables Across Models

Independent Variable \ Equality	M1=M2=M3	M1 = M2	M1 = M3	M2 = M3
Unified Democrat Control	**0.06**	**0.03****	**0.02****	**0.75**
Unified Republican Control	0.50	0.30	0.24	0.95
Inter-Party Competition	**0.13**	**0.08***	**0.26**	**0.10***
Electoral Competition	0.01**	<0.01***	<0.01***	0.50
Government Liberalism	**0.37**	**0.26**	**0.17**	**0.78**
Citizen Liberalism	0.52	0.40	0.67	0.29
Income	**0.65**	**0.47**	**0.37**	**0.83**
Unemployment	**<0.0001*****	**<0.0001*****	**<0.0001*****	**0.14**
Federal Aid	**<0.0001*****	**0.01*****	**<0.0001*****	**0.03***
Elderly	0.87	0.65	0.60	0.95
African-American	0.28	0.97	0.51	0.14
Hispanic	**<0.01*****	**0.01****	**<0.001*****	**0.17**
Poverty	0.97	0.81	0.81	0.97

Note: M1, M2, and M3 indicate each model that uses a different dependent variable measure. Model 1 employs the Census measure of welfare commitment, and Model 2 uses Comprehensive measure 1 which adds to the Census measure state spending on Unemployment Insurance, Workers' Compensation, and public education. The dependent variable measure used in Model 3 is Comprehensive measure 2 which is Comprehensive measure 1 net of commitment on public education. ***p<0.01, ** p<0.05, *p<0.10
a. Independent variables in bold indicate those whose coefficient is statistically significant at the 10% significance level or less at least in one model.
b. P-values are rounded to the second decimal.

Comparing the results from Table 3.3, Table 3.4, and Table 3.5 reveals that we would have gained different understanding especially of the role four variables—i.e., *Unified Democrat Control*, *Unemployment*, *Federal Aid*, and *Hispanic*— play in explaining state welfare commitment depending on the choice of policy output measures. They differ not only in terms of to what extent they are a statistically significant predictor but also in terms of the magnitude of their marginal effects. For example, a researcher who uses the Census measure will find that *Unified Democrat Control* does not predict the degree to which states commit to welfare, whereas one who uses the Comprehensive measure 2 will conclude that who controls a state government matters for state spending on welfare. Similarly, some who use the Census measure will find a relatively small effect of Hispanic compared to those who employ the Comprehensive measure 1.

3.7 Discussion and Conclusion

This study analyzes a series of a panel data model with state and year fixed effects to empirically test whether the choice of the indicators of state welfare commitment makes any difference for the findings in studies of state welfare policy determinants. This paper adds value to the literature in that it gives attention to the dependent variable—i.e., state welfare policy—and focuses on how different scholars define and operationalize it. While many scholars have examined state welfare policy producing diverse studies, the discussion of how we define and measure state welfare policy is surprisingly scarce. The natural corollary of this is that we do not know whether the selection of dependent variables matters for the findings in studies of state welfare policy. After assessing the literature as a whole as to whether studies have found consistent or inconsistent results on their key independent variables of interest, I hypothesized that there would be differences in coefficients of independent variables depending on which measure of state welfare commitment we investigate as a dependent variable.

The findings support the hypothesis. The empirical results show that the measures we use shape the kinds of results we get. Whether the coefficient of independent variables matters for state welfare commitment differs across the models using different measures of state welfare commitment as a dependent variable. What these findings imply is that studies of state welfare policy and politics appears to be examining the same phenomenon on the surface but they could be telling us about different parts of welfare policy, and not about welfare policy more generally. Inconsistency in the empirical results across the models also implies that the findings are not robust across different model specifications. Therefore, this study highlights that it is important to have better understanding of what we examine as a phenomenon and we need to be cautious about reporting the empirical results.

Then, what might explain the differences in the findings across the models examined in this study? Regarding the influence of *Unemployment*, it is likely that the two broader measures of state welfare commitment capture an underlying phenomenon that the narrower measure does not pick up, thus producing the difference in the findings. Recall that the estimation results show that unemployment rate matters in two models where I use broader conceptions of welfare; however, it is not statistically significant and even negatively signed in the other model with the dependent variable reflecting the narrower definition of welfare. On the one hand, the inclusion of spending on Unemployment Insurance and Workers' Compensation in the measures of state welfare commitment could make the change in unemployment rate possible to capture the variation in broader measures across states mainly because the two programs serve unemployed individuals. On the other hand, it is reasonable to think that the association between unemployment rate and state welfare commitment in Model 2 and Model 3 has to do with unobserved dynamics that political power of unions brings into state welfare policy making.

Similarly, *Unified Democrat Control* determines state welfare commitment in the two models using the broader measures, whereas it does not matter in the model with the narrowest measure. Moreover, its marginal effect is not close to identical across the models; the effect is shown to be larger in Model 2 and Model 3 compared to Model 1. Again, these results could be suggesting that there are underlying dynamics related to organized interests such as unions which are not adequately captured in these models but presumably closely related with the working of partisan control in determining state welfare commitment. Unions are better organized and politically active than welfare recipients, so it is easier for unions to mobilize political power to influence welfare policies at their stake. It could be that this relationship between unions and partisan control produces the results we see in Model 2 and Model 3. However, it seems that this underlying dynamic is not at work in states' decision making when only narrowly defined welfare policies are considered.

Lastly, the results indicate that the marginal effects of *Hispanic* are greater in Model 2 and Model 3 than in Model 1, and they are statistically different from one another across the three models. Also, contrary to findings from previous studies (Preuhs, 2007; Matsubayashi & Rocha, 2012), the effect of *Hispanic* is positive, meaning that a state with a greater percentage of Hispanic population tends to show greater commitment to state welfare programs. In fact, the measure of *Hispanic* used in this study might not be good enough to capture a backlash effect on welfare spending, and rather reflects a growing trend, and thus increasing demand for welfare, in Hispanic population in the U.S. during the time period examined. From 2000 to 2010, the number of Hispanic increased by 44.1%, which was the second fastest growing ethnic/racial group following Asian. The increase accounted for 55.6% of total population growth during that time (Pew Research Center, 2012). The percentage of Hispanic children under 18 increased from 17.2% to 23.2% during the same period (Federal Interagency Forum on Child and Family Statistics, 2017). In addition, statistics show that Hispanic workers suffer more injuries and illness at their work place than any other ethnic/racial group (U.S. Bureau of Labor Statistics, various years). All these statistics suggest the possibility that state spending on public education and Workers' Compensation are affected by the growth of Hispanic population, which is probably why I find a strong association between *Hispanic* and the two broader measures of state welfare commitment.

This study opens up new questions that call for further empirical research. While previous studies have shown whether and why a particular factor matters, the findings in this paper motivate us to ask, for example, why a certain factor matters for a particular kind of welfare commitment measure but not others. I discuss possible scenarios as to why I have different results across the models, but future research can further delve into this question. Eventually, this study provides better grounding for future studies that examine the question of who gets what and the associated politics of state welfare policy. Thinking through what a dependent variable truly measures would help interpreting implications from empirical results, which would in turn advance theories of state welfare policy making.

CHAPTER 4

DESERVINGNESS AND STATE WELFARE POLITICS IN THE POST-WELFARE REFORM ERA

4.1 Introduction

Students of state welfare policy have long been interested in the underlying mechanisms that determine who gets what from governmental decisions, and in particular, associated politics of welfare policy has been at the center of their inquiry. Wide variation in welfare policy across states has provided a perfect setting to uncover and understand state welfare politics. Among other aspects, scholars have paid attention to the generosity of welfare policies—that is, to what extent a state is generous in providing welfare benefits to individuals or families who are recipients or potential recipients of welfare benefits (Bailey & Rom, 2004; Jennings, 1979; Preuhs, 2006; Reingold & Smith, 2012; Ringquist, Hill, Leighley, & Hinton-Andersson, 1997). Compared to the pre-welfare reform period, the 1996 welfare reform sparked greater scholarly attention, making it a watershed moment in the history of American welfare states. While this historical event leads to a number of scholarly work in the post-welfare reform era, a majority of studies focus on examining the generosity of cash benefit levels, eligibility rules, or strictness of sanctions (Avery & Peffley, 2005; Fellowes & Rowe, 2004; Filindra, 2002; Reingold & Smith, 2012; Soss, Schram, Vartanian, & O'Brien, 2001).

The limited scope of scrutiny in the literature limits our understanding of state welfare politics in the period after the reform. Has the politics of welfare generosity in the American states changed since the welfare reform of 1996? In particular, does the effect of party politics differ across welfare policies? This paper aims to answer this question and updates the previous scholarship on state welfare politics regarding generosity. I pay particular attention to the notion of deservingness of target populations, and examine three welfare policies for different target populations to explore the nuance of welfare politics associated with generosity. Findings from earlier studies, albeit only a few, suggest that politics might differ across welfare policies serving different target populations (Bailey & Rom, 2004; Barrilleaux & Bernick, 2003). Stereotyping welfare recipients as deserving or undeserving poor can be traced back to the 18th century (Katz, 1989; Patterson, 1994). However, the welfare reform which changed the landscape of welfare in the American states might also have affected the way the public view welfare policies and recipients of welfare as well.

The examination of three welfare policies reveals that party politics still remains as an important factor in explaining state welfare generosity. However, its significant effect is more pronounced in welfare policy for the undeserving poor, and the direction of effect is not always consistent with what previous studies find. Overall, this study suggests that the deservingness of target populations plays a role in the way in which politics produces welfare generosity across states. I conclude by discussing the direction future efforts might head to shed light on unexpected findings of this study and more generally state welfare politics in the post-welfare reform environment.

4.2 Studies on Deservingness and State Welfare Politics

The notion of deservingness of the poor has been around for a century in the history of the American welfare state (Katz, 1989). People more than often depict welfare recipients as the “deserving” or “undeserving” poor; the distinction among the poor frequently appears in media discourses and political rhetoric when commentators discuss welfare policy issues. We observed in the debate over the welfare reform in 1996 that this distinction has grown sharper; as a way of reducing welfare dependency, welfare programs introduced work requirements as a condition to receive benefits. Many programs were redesigned to help individuals who work, characterizing those without jobs as undeserving of public assistance (Moffitt, 2015).

The deservingness literature argues that the perceived deservingness of welfare recipients is a key driver of support for welfare policies; how people judge recipients in terms of deservingness of help influences public opinion and attitude of welfare programs and benefits (Appelbaum, 2001; Petersen, 2012; van Oorschot, 2000). Although a majority of these studies investigate European countries, scholars find that the perceptions of welfare recipients affecting people's willingness to support welfare is universal across different countries (Petersen, 2012; Petersen, Sznycer, Cosmides, & Tooby, 2012; van Oorschot, 2000).

An extensive literature in political psychology examines what criteria people use to distinguish those who deserve welfare benefits from those who do not. Studies demonstrate that people make this distinction by looking at whether individuals are responsible for their deprivation and whether they make efforts to alleviate the need to get help from welfare (Cavaillé, 2015; Gilens, 1999; Petersen, 2012; Petersen et al., 2012; Thomann & Rapp, 2018; van Oorschot, 2000; van Oorshot, 2006). The "deserving" poor are people who do not intend to be in a needy situation but they are affected by factors beyond their control. They are perceived as individuals who cannot work even if they wish to, and thus they are not expected to work and are considered as deserving of help. On the contrary, the "undeserving" poor are those who are perceived to be responsible for their neediness. They are perceived as making a choice not to work and prefer to live off public assistance because they are lazy. In this regard, the elderly, the sick, people with severe disability, and children deserve welfare, whereas people who do not work although they are capable of working do not. As such, findings from deservingness studies imply that the politics of welfare policy would be different depending on how the public judges the deservingness of welfare recipients. Policymakers do care about public opinion, and there is robust evidence that public opinion influence policymakers and policy making (Burstein, 2003; 2010).

Meanwhile, the social construction theory provides a stronger rationale as to why we would expect the politics of welfare to be different across welfare policies that serve different target populations. In fact, it directs our attention to look at the link between the deservingness of target populations and policy design, and thus provides a theoretical grounding to believe that policymakers may treat policies for the deserving poor differently from those for the undeserving poor. According to Schneider and Ingram (1993), the reason why some groups are advantaged from public policies more than others can be explained by the social construction of a target population and the power of that group. Social construction is a stereotype of a group of people that is built through ideology, culture, politics, and history, which is closely linked with whether a group is viewed as deserving or undeserving of help. Schneider and Ingram (1993) argue that a target population would get either symbolic or substantial benefits/burdens from policies depending on how it is viewed from public and politicians in terms of social construction and whether that population possesses political power. Target populations can be categorized into four groups—i.e., Advantaged, Contenders, Dependents, and Deviants—

by looking at whether they have positive or negative social construction—i.e., deserved by the public—or whether they are politically powerful or not. Policymakers concerned with re-election respond to the social construction of target populations through policy design because they can gain political support from their electorates through "feed-forward" effects. In addition, policymakers have incentives to reinforce or alter the social construction through policy design as they see it benefiting their electoral gains (Ingram, Schneider, & deLeon, 2007, p. 106-107).

As such, research on deservingness and social construction suggests that welfare politics surrounding policies for the deserving and undeserving poor would be distinctive. However, only a few scholars have tested this proposition. Identifying general assistance (GA) as a policy for the undeserving poor and Supplemental Security Income-State Supplements (SSI-S) as a program for the deserving poor, Barrilleaux and Bernick (2003) show, most importantly, that electoral competition exerts statistically significant influence on welfare efforts of each program in an opposite direction. Greater electoral competition leads to an increase in SSI-S effort, while it results in a decrease in GA effort. They also find that generosity of SSI-S, defined as SSI-S benefits per SSI recipient, increases when a state has more liberal citizen ideology, a greater electoral competition, and a higher percentage of African-Americans. They were not able to examine GA generosity due to lack of reliable data. Although Bailey and Rom (2004) do not specifically discuss the deservingness of target populations, they examined several policies that presumably can be categorized into different categories in terms of recipients' deservingness—such as Medicaid, SSI-S, and Aid to Families with Dependent Children (AFDC)—and find that different factors explain policy outputs differently.

Their results show, for example, that greater Democratic strength leads to an increase in the cost and access of AFDC and Medicaid, while it is associated with a decrease in Medicaid generosity, operationalized as expenditure per recipient.

These studies look at the period before the welfare reform in 1996 or the period covering a few years after 1996. Therefore, we do not know whether their findings hold in the post-reform era. It is possible that emphasis on work, especially in Temporary Assistance for Needy Families (TANF) programs, might influence the way the public and policymakers view the policy and its target population and change welfare politics. However, we do not know until we test it empirically. In the following section, I discuss the choice of three welfare policies examined in this study and provide policy backgrounds and states' role in each policy.

4.3 State Discretion over Welfare Policies

While we do not have survey or study results that identify recipients of which specific welfare policies the American public perceives as deserving versus undeserving, both studies on deservingness and social construction of target populations provide a guidance in choosing which state welfare policies to examine. Studies find that the public views the elderly, the sick, people with disabilities, and children as deserving of public assistance, while viewing unemployed people as undeserving (Larsen, 2006; van Oorschot, 2000; 2006). Based on this finding, I choose Temporary Assistance for Needy Families (TANF), Supplemental Security Income-State Supplements (SSI-S), and Medicaid for comparison. While these are state-federal funded programs, state governments play a key role in providing benefits and services through each program. State governments exert discretion over important aspects of the program; for TANF and

Medicaid, state governments are free to design each program to tailor it to the needs and preferences of their citizen under general guidelines from the federal government. States use flexibility in setting the TANF benefit level, among other policy choices, whereas they decide which optional populations and medical services to cover under Medicaid. For SSI-S, state governments decide whether to provide additional monetary benefits on top of the federal SSI as well as the level of benefits they choose to provide.

Note, however, that these programs are different in terms of target populations they serve. While TANF is often perceived as a program for the undeserving poor often depicted as ‘welfare queens’ who are morally deficient and as lazy people who are unwillingness to work (Bridges, 2017; Oorschot, 2006; Oorschot & Roosma, 2015), SSI-S is a program that provides benefits to people who are over 65, blind, or have disabilities (including children) but need assistance due to no fault of their own, i.e., a group that is perceived as deserving poor (Bridges, 2017).

As the most expensive state welfare program, Medicaid plays an important role in the U.S welfare system, covering 66 million people as of January 2019. While it is the largest program, Medicaid is relatively ambiguous to categorize in terms of the deservingness of the target population, partly because the target population is diverse. In its inception, Medicaid was viewed as a program for the deserving poor since it was initially started as medical support for recipients of cash welfare through vendor payments in 1950 (Moore & Smith, 2005; Thompson, 2012). However, ten years later, medical benefits were extended to cover people over 65 who would otherwise be unable to pay medical costs. In 1965, when Medicaid program was signed into law, the legislation mandated that states provide medical assistance also to people with disabilities and low-income families with children if they participate in the program. Over the last 25 years, the program has evolved to cover more people, including children and pregnant women in low-income families (Moore & Smith, 2005; Kronebusch, 2001). Therefore, comparing Medicaid together with the other two welfare programs would be useful to investigate the nuance of welfare politics in states. In the following, I discuss the ways in which state governments exert discretion over each program.

4.3.1 TANF

Jointly funded by the federal government and states, TANF programs provide cash assistance and support services to low-income families with children. As the product of the 1996 Personal Responsibility and Work Opportunity Reconciliation Act (PRWORA), it replaced AFDC to "end welfare as we know it". Many aspects mark stark differences from the predecessor, AFDC. For example, while AFDC recipients had access to cash welfare without a time limit, the bill set a time limit for TANF cash benefits. Also, the federal government required work and work-related activities to receive cash support. The most distinct difference, however, is that states have wide latitude in designing and implementing TANF programs. Within broad federal guidelines, states have discretion over the use of both federal TANF funds and state maintenance-of-effort (MOE) funds and cater their own TANF programs to meet the needs of their citizen. As a result, states vary considerably in the way they spend TANF money and in the rules that govern cash assistant (Falk, 2011; 2016; Schott, Floyd, & Burnside, 2019).

4.3.2 SSI-S

Supplemental Security Income (SSI) is a federal means-tested welfare program that provides nationwide cash benefits to the elderly, the blind, and people with disability (including children). Enacted in 1972, it started paying benefits in 1974, replacing state funded and operated programs of assistance to the elderly, the blind, and those with disabilities. As a national program, its eligibility requirements and minimum benefit standards are set by the federal government. However, states can opt to provide additional income support on top of federal SSI payments, which is known as optional state supplements.[18] States' discretion over the optional supplemental program is three-fold. First, states make a decision on whether to offer this optional program. Second, states that choose to supplement the federal SSI payments decide who administers the supplemental payments. States may administer the programs themselves, request the Social Security Administration (SSA) to administer their programs, or jointly administer them with the SSA. Lastly, states that administer their own programs can make their own eligibility criteria and decide the amount of payments for the optional state supplements. Some states provide supplements for all who are eligible for SSI, and others selected certain categories of SSI recipients. Also, there are states that extend the supplements to those who are ineligible for SSI. However, if states choose to implement the supplemental programs as federally-administered program, they must follow the rules of SSA regarding eligibility criteria and payment amounts and pay a fee per each supplemental payment to SSA.[19] As such, states can exercise discretion over state supplemental payments, which generates variation across states in SSI-S generosity.

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[18] In addition to optional state supplements, states have responsibility to provide mandatory state supplements to keep the 1973 income levels of beneficiaries of the former state adult assistance programs so that the beneficiaries do not lose benefits when they were converted to the SSI program in 1974. Currently, mandatory payments apply to few people mainly due to the death and the increase in federal benefit levels since its inception. SSA reports that there were roughly 1,900 recipients of mandatory supplements nationally in 2000 (SSA, 2001).

[19] A fee ranges from $7.60 to $8.77 per supplementary payment during the period examined in this study.

4.3.3 Medicaid

Medicaid is by far the largest state welfare program; it provides primary and acute medical services and long-term care services to low-income individuals and families.[20] It is a means-tested entitlement program jointly funded by the federal government and the states. The federal government matches state spending on Medicaid based on the Federal Medical Assistance Percentage (FMAP). While it started, in 1965, as a health coverage only for those who receive cash assistance, the program incrementally expanded to benefit a broader population. Today, Medicaid covers not only low-income children and families but also the aged, people with disabilities, the blind, and pregnant women and infants.

States have broad discretion to administer, design, and implement their own Medicaid programs. While the federal government mandates that all states must meet basic requirements such as providing certain types of services and covering certain groups of individuals, known as the mandatory eligibility groups, states have discretion to extend coverage beyond the federal mandatory eligibility groups, and they also can determine which optional medical services to cover. Due to this flexibility given to states, wide programmatic variation exists from state to state, leading to variation in Medicaid generosity.

4.4 Hypotheses

The scholarly discussion on the social construction of target populations and deservingness of the poor suggests that politics involved in generosity of state welfare

[20] In FY 2018, the estimated combined federal and state Medicaid expenditures account for 29.7% of total state expenditures ($603,166 millions). State Medicaid is the second largest program area next to elementary and secondary education, representing 17.1% of state funds ($233,271 millions) (NASBO, 2018).

policy might differ across programs serving different target populations. Also, a couple of studies provide empirical evidence that the target populations matter for state welfare politics at least where the pre-reform era is concerned (Bailey & Rom, 2004; Barrilleaux & Bernick, 2003). Building on the existing scholarship on state welfare politics, this study tests hypotheses focusing on party politics. In particular, I examine the role of party competition and party control in welfare policymaking. These two together with government ideology are the most frequently examined political variables in the literature, but the findings are not consistent across studies.

First, the degree of competition between two major parties is likely to influence generosity of welfare policies differently depending on which target population policies serve. In his analysis of Southern politics, V.O. Key (1949) argues that heightened competition between the parties leads to policy outputs that are more responsive to the needs of the disadvantaged. It is because parties facing increased competition or the risk of electoral defeat have an incentive to appeal to constituencies as politicians seek votes, whereas parties under a lower level of competition have little incentive to broaden their electoral coalitions and represent median voters (Key, 1949). The empirical evidence is somewhat mixed. While some studies find that electoral competition is not a good predictor of welfare generosity or effort (Preuhs, 2006; 2007), others demonstrate that the effect of electoral competition is conditioned by other factor to have positive relationship with state welfare spending (Barrilleaux, Holbrook, & Langer, 2002). However, many studies find that a state with more competitive party system tends to have overall more liberal state policy (Barrilleaux, 1997), a higher cash benefits level (Hero & Preuhs, 2007; Ringquist et al., 1997), greater welfare effort (Barrilleaux & Bernick, 2003), and less strict sanctioning rules under TANF programs (Soss et al., 2001). More relevant to this study is Barrilleaux & Bernick's (2002) work which investigates the impact of electoral competition on SSI-S and General Assistance (GA) programs. Consistent with their expectation, they find that states with higher degree of electoral competition are likely to spend more on SSI-S—i.e., the program for the deserving poor—but less on GA—i.e., the program for the undeserving poor.

Given that the TANF program is perceived as a policy for the undeserving poor, it is likely that heightened party competition lowers TANF generosity as politicians would put efforts to win election by producing a policy that is more representative of the preferences of state citizens over TANF, i.e., the preferences that are inferred by the perceived deservingness on TANF recipients. Also, TANF recipients possess relatively weak political power, and thus there is little incentive for politicians to appeal to them. On the contrary, heightened party competition is likely to lead to increased SSI-S generosity because SSI-S recipients are not only politically more active and powerful but also have positive images as a group deserving public assistance. Therefore, I expect that greater party competition will lead to more generous welfare policy for the deserving poor but less generous policy for the undeserving poor. For Medicaid, the expectation is not that straightforward, given that population benefiting from Medicaid contains a mix of recipients, some of whom are perceived deserving and others of whom are perceived undeserving. However, given that the 1996 welfare reform decoupled the link between Medicaid eligibility and cash assistance (i.e., TANF), the stigma attached to Medicaid and Medicaid recipients could have been weakened (Brecher & Rose, 2013). If this is the case, the political dynamics under Medicaid decision-making would resemble closer to that of SSI-S rather than TANF.

Hypothesis 1*: Party competition will have opposite effects on state welfare generosity depending on the deservingness of target populations a policy serves. Specifically, as party competition becomes heightened, a state will have a less generous TANF policy but more generous SSI-S policy and Medicaid policy.*

While I expect that party competition exerts an independent effect on the generosity of a policy as stated in Hypothesis 1, the discussion above also suggests that the effects of competition ought to depend on the direction of citizens' preferences. More liberal citizens tend to prefer more generous welfare policy. Therefore, I expect that the joint effects of party competition and citizen liberalism on welfare generosity will be positive regardless of the deservingness of a target population. As a results, it is also expected that as citizens become more liberal, the positive effects of party competition on the generosity of welfare policy for the deserving poor are likely to be reinforced; however, the negative effects of competition on the generosity of welfare policy for the undeserving poor would be weakened.

Hypothesis 2*: The effect of party competition will be conditioned by the relative liberalism of state citizens. Specifically, as citizens become more liberal, party competition will exert a stronger effect on the generosity of TANF, SSI-S, and Medicaid policy.*

Next, state discretion over each program allows partisan control of state government to influence generosity of a given program. Together with party competition, partisan control is one of the most frequently examined political variable in the literature.

The literature typically finds that greater presence of Democrats in or Democratic control over a state government is associated with more generous welfare policy; under Democratic control, states are likely to adopt less strict rules under TANF programs (Avery & Peffley, 2003; Fellowes & Rowes, 2004), provide more generous cash benefits (Hero & Preuhs, 2007; Preuhs, 2006; Ringquist et al., 1997), and exert greater welfare efforts (Gilligan & Matsusaka, 1995; Hwang & Gray, 1991). However, some studies find evidence that more Democrats in control does not necessarily affect welfare policies to benefit the disadvantaged more (Bailey & Rom, 2004; Barrilleaux & Bernick, 2003; Fellowes & Rowe, 2004; Kousser, 2002). The findings from Bailey and Rom (2004) and Barrilleaux and Bernick (2003) suggest that the impact of partisan control might differ depending on which welfare policy we examine. Both studies examine multiple welfare policies which are presumably for different target populations with different perceived deservingness and show that the degree of Democratic strength influences welfare policies differently.

Following the prevailing findings in the literature, however, I expect that states with unified Democratic control of both houses of the legislature and the executive will shape a welfare policy more favorable to the poor because, on average, Democratic parties are relatively more liberal than Republican parties. I do not expect that unified Democratic control will negatively affect welfare generosity for the undeserving poor—i.e., TANF. Although TANF and SSI-S target different populations in terms of their deservingness of welfare benefits, the fact that both are welfare policies does not change. The perceived undeservingness of TANF recipients is less likely to nullify the tendency that Democrats produce relatively more liberal policies compared to Republicans. In the same vein, the effect of unified Republican control is expected to work the same way; regardless of a welfare policy examined, unified Republican control will produce policy output less favorable to the poor. In short, the expected direction of the influence of unified Democrat control or that of unified Republic control on each of these policies should not differ across the policies. However, I expect that the presence of unified Democrat control decreases Medicaid generosity, if any, while unified Republic control of the state government increases Medicaid generosity. Note that the measure of Medicaid generosity is obtained by dividing state total Medicaid expenditures by Medicaid enrollees. Previous studies on Medicaid find that Republican control leads to a decrease in the number of enrollees due to less spending on Medicaid, which in turn results in more spending per enrollees (Bailey & Rom, 2004; Kronebusch, 1993). Therefore, the two hypotheses follow.

Hypothesis 3-1*: A state with unified Democratic control of the state government will have a more generous welfare policy than a state with full control by Republicans or split control; and the direction of effect will be the same for a welfare policy for the deserving and undeserving poor. However, unified Democratic control in a state will reduce Medicaid generosity.*

Hypothesis 3-2*: A state with unified Republican control of the state government will have a less generous welfare policy than a state with full control by Democrats or split control; and the direction of effect will be the same for a welfare policy for the deserving and undeserving poor. However, unified Republican control in a state will increase Medicaid generosity.*

4.5 Methods

4.5.1 Welfare Generosity Models

To find out whether the influence of various factors on state welfare generosity differs across the three programs, I estimate three models with similar independent variables. For all three models, I initially planned to use the Arellano-Bond (1991) estimation technique because I modeled welfare generosity as a dynamic process in which generosity changes incrementally over time. Since state and year fixed effects are included together with a lagged dependent variable, obtaining OLS or GLS estimators would results in inconsistent estimators due to autocorrelation between the lagged dependent variable and residuals. The Arellano-Bond generalized method-of-moments estimator deals with this problem by allowing lagged values of the dependent variable to be included in the model as an additional independent variable. However, TANF and Medicaid models failed the test of instrument variables being uncorrelated with error terms, indicating that the Arellano-Bond is not a valid method for examining TANF and Medicaid generosity. A further test of unit root in dependent variables of TANF and Medicaid generosity models shows that unit roots are present in the measure of Medicaid generosity while they are not in the measure of TANF generosity.[21] Therefore, I use the fixed effects model for TANF and the first difference model for Medicaid. By differencing each variable in the Medicaid model, I can remove all unobserved time-invariant characteristics within the states which may impact the independent and the dependent variables. The fixed effects estimator can work the same way with regard to

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[21] The unit root test of TANF generosity measure rejects the null hypothesis that all panels contain unit roots (p-value<0.0001), whereas that of Medicaid generosity measure fails to reject the null (p-value ranges from 0.30 to 0.76).

dealing with unobserved heterogeneity. However, the first difference estimator is more efficient than the fixed effects estimator if the error term in the original model—i.e., the model with variables before differencing—follows a random walk, in other words, if there is serial correlation in the error term, which is the case in Medicaid generosity. Both TANF and Medicaid models are estimated by OLS with standard error clustered at the state level. Meanwhile, I am able to use the Arellano-Bond estimation technique with state and year fixed effects for SSI-S program, as I initially planned. In the Appendix C, I discuss the results of post-estimation diagnostic tests for the Arellano-Bond estimation.

For TANF and Medicaid generosity models, the data cover 49 states excluding Nebraska as it has a non-partisan state legislature. The SSI-S generosity model estimates 47 states; it excludes Nebraska, Missouri, and North Dakota. Missouri and North Dakota are omitted as there is inconsistency in reporting their SSI-S payment data. Although I focus on the period after the welfare reform in 1996, due to the difference in availability of the data on dependent variables, the years covered by these models are not identical to each other; the TANF model provides estimates for the period from FY 1999 to FY 2010, the SSI-S model from FY 2002 to FY 2004, and the Medicaid model from FY 2002 to FY 2010.

The specific form of each model is as follows:

TANF Generosity: $\boldsymbol{Y}_{s,t} = \alpha_0 + \beta_1 \boldsymbol{X}_{s,t-1} + \mu_s + \lambda_t + \varepsilon_{s,t}$,

where $\boldsymbol{Y}$ is TANF generosity in state *s* at time *t*. $\boldsymbol{X}_{s,t-1}$ is the vector of political, economic, programmatic, and demographic factors of state *s* at time *t-1*. μ_s is the unobserved time-invariant state effects, and λ_t is the fixed effects of year. $\varepsilon_{s,t}$ is a random error term of state *s* at time *t*.

$$\textbf{SSI-S Generosity}: \boldsymbol{Y}_{s,t} = \alpha_0 + \beta_1 \boldsymbol{X}_{s,t-1} + \beta_2 \boldsymbol{Y}_{s,t-1} + \Sigma\rho_t D_t + \varepsilon_{s,t},$$

where $Y_{s,t}$ is SSI-S generosity in state *s* at time *t*. $\boldsymbol{Y}_{s,t-1}$ denotes a lagged dependent variable. $\boldsymbol{X}_{s,t-1}$ is a vector of political, economic, programmatic, and demographic factors of state *s* at time *t-1*. D_t indicates a year dummy variable. $\varepsilon_{s,t}$ is a random error term of state *s* at time *t*.

$$\textbf{Medicaid Generosity}: \boldsymbol{\Delta Y}_{s,t} = \alpha_0 + \beta_1 \boldsymbol{\Delta X}_{s,t-1} + \Sigma\rho_t D_t + \boldsymbol{\Delta}\varepsilon_{s,t},$$

where Δ denotes the change from t-1 to t. Therefore, $\boldsymbol{\Delta Y}$ is the change in Medicaid generosity from *t-1* to *t* in state *s*. $\boldsymbol{\Delta X}_{s,t-1}$ is the change in a vector of political, economic, programmatic, and demographic factors from *t-2* to *t-1* of state *s*. D_t indicates a year dummy variable, and $\boldsymbol{\Delta}\varepsilon_{s,t}$ is the change in a random error term from *t-1* to *t* in state *s*.

4.5.2 Dependent Variables

For TANF and Medicaid program, I operationalize welfare generosity as per recipient state total expenditures for a given program. I use state expenditures funded by state own resources excluding federal share in total expenditures of each program. Therefore, state total TANF expenditures include state TANF spending through state MOE contribution in state TANF programs and state separate programs. Note that the TANF spending data I use is limited to spending under the "assistance" expenditure category only. It is because available TANF caseload data count only the individuals receiving TANF "assistance" and exclude recipients of "non-assistance". Assistance expenditures include basic assistance (aka, cash assistance) and other benefits to unemployed families such as child care and transportation. Expenditures on non-assistance includes work subsidies to employers, education/training, child care and transportation for employed families, and refundable tax credits such as state EITC. I obtain the financial data from the Administration for Children and Families (ACF). Therefore, focusing on assistance is likely to reveal welfare politics for the undeserving poor more clearly as unemployed people on welfare will have less favorable social construction than people who are working but still need help.

I calculate state Medicaid expenditures (including Children's Health Insurance Program) by multiplying combined state and federal Medicaid spending by the Federal Medical Assistance Percentage (FMAP). The data comes from the Medical Statistical Information System (MSIS) database. MSIS is a reporting system through which the Center for Medicare and Medicaid Services (CMS) collects Medicaid data from states. CMS website provides publically available state summary tables that contains aggregated level statistics relating to Medicaid eligibles, beneficiaries, and payments for Medicaid services.

To measure SSI-S generosity, however, I use per recipient annual average state total SSI-S benefit payments (both mandatory and optional supplements), which captures the dollar amount that each SSI-S recipients receives on average. Supplements administered by state and federal government are both taken into account. It would be ideal to examine a welfare generosity measure operationalized in the same way across the three programs, but SSI-S spending data are only available for benefit payments. Given that the main function of SSI-S program is to provide additional cash assistance to recipients, I assume that the results of using a SSI-S generosity measure that takes into account administrative costs of the program would not make discernible differences from what I present here.

4.5.3 Key Independent Variables

My principle theoretical interest is in party politics regarding party competition and partisan control. First, I test the impact of party competitions through two different measures: *Inter-Party Competition* and *Electoral Competition.* For *Inter-Party Competition*, this study uses the "folded" Ranney (1976) index, which measures the degree of competition between two parties for control of a state government using the partisan composition of state legislatures, the vote share for the parties' gubernatorial candidates, and the percentage of time that the parties held both the governorship and a majority in the state legislature (Hill, 2003; Shufeldt & Flavin, 2012). The "folded" Ranney (1976) index ranges from 0.5 to 1, 0.5 denoting one party dominance and 1 indicating perfect competition between the two parties. For *Electoral Competition*, this study uses Holbrook and Van Dunk's (1993) (HVD) measure that utilizes the data on district-level state legislative elections, more specifically on the information on vote won by winners in a district, the margin of victory, whether the seat is safe, and whether the election was contested (Barrilleaux et al., 2002; Holbrook & Van Dunk, 1993). Compared to the Ranney index, Holbrook and Van Dunk (1993) provides a more direct measure of overall electoral competitiveness of individual state legislative elections, thus focusing on electoral dynamics. The measure ranges from 0 to 100, 100 indicating most competitive environment.

Inspired by V. O. Key's (1949) proposition on inter-party competition, scholars have tested inter-party competition and electoral competition interchangeably although both evaluate different concepts (Barrilleaux et al., 2002; Hill, 2003; Shufeldt & Flavin, 2012). Therefore, we do not know how the subtle difference in these measures plays out a role in state welfare policymaking. Since the Ranney index and HVD measure do not highly correlated which other, I test the effect of both variables in a single model.

Second, to test the effect of partisan control on welfare generosity, I include *Unified Democratic Control* and *Unified Republican Control*, indicating whether Democrats or Republicans control all branches of a state government. It takes a value of one when Democrats (or Republicans) control both state legislatures and governorship, and otherwise zero. The measures come from Klarner's dataset on state partisan balance (Klarner, 2013b). Among many other partisan control variables in the dataset, I use the variables that take veto proof majorities and super-majority requirements for budget passage into account to code the party "truly" in control of state government (Klarner, 2013b). Some previous studies use different measures of partisan control such as a separate measure for legislatures and governorship (Matsubayashi & Rocha, 2012) or rather use Democratic strength in state legislatures measured as a number or a percentage of legislative seats held by Democrats (Barrilleaux et al., 2002; Gilligan & Matsusaka, 1995; Krueger & Muller, 2001). The interest in this study is to examine whether a full Democratic control or Republican control of the decision making bodies in the state government produces similar policy output in terms of generosity of welfare policies for different target populations. Therefore, I construct these variables to reflect control over both executive and legislative branches. Compared to divided government, unified Democratic control (unified Republican control) would make Democrats (Republicans) easier to realize a policy that is relatively closer to their ideological orientation.

4.5.4 Controls

Beyond party politics variables, I add other relevant political, economic, programmatic, and demographic variables to the models. These variables are included in all three models, if I do not mention otherwise. The political variables include government liberalism and citizen liberalism. *Government Liberalism*: It measures the relative liberalism of a state government, i.e., how close to the left state elected officials stand on the ideological continuum. For this measure, I use Berry, Fording, Ringquist, Hanson, and Klarner's (2010) NOMINATE measure of state government ideology (0 to 100), with larger numbers indicating a more liberal government ideology. While the findings are mixed, there is empirical evidence that states with more liberal government ideology are more generous in terms of welfare spending level (Hill & Leighley, 1992) and adopt less strict TANF rules (Avery & Peffley, 2003; Fellowes & Rowes, 2004; Soss et al., 2001). *Citizen Liberalism*: This variable measures the relative liberalism of citizens in each state. The data for this variable comes from an updated version of Berry et al.'s (1998) study on the measure of citizen and government ideology in the American states (0-100), with larger numbers reflecting a more liberal citizen ideology. Studies generally find that a state with more liberal citizens tends to adopt more generous welfare policy (Barrilleaux & Bernick, 2003; Fellowes & Rowes, 2004; Ringquist et al., 1997; Reingold & Smith, 2012).

Economic factors include income, wage, and unemployment rate. *Income*: This variable indicates fiscal capacity of a state, measured as log of per capita state personal income. States with greater fiscal capacity have a tendency to spend more on welfare programs (Hill & Leighly, 1992; Krueger & Muller, 2002; Gilligan & Matsusaka, 1995;

Kousser, 2002). *Wage*: This is operationalized as log of mean annual wage in a state. In response to a decrease in workers' wage, policymakers might make welfare policy more generous, or alternatively, they might produce less generous welfare policy to avoid welfare dependency among the poor (Bailey & Rom, 2004; Berry, Rom, & Hanson, 2003). U*nemployment*: This variable is measured as the percentage of state labor force who are unemployed. This variable shows how well a state is doing economically. Under stronger economy, policymakers might push people out of welfare and to the labor market by limiting the use of welfare programs (Avery & Peffley, 2003; Jennings, 1983; Soss et al., 2001), but it is also likely that they response with more generous welfare policy because states has greater capacity to do so (Bailey & Rom, 2004).

I include two programmatic factors in each models. *TANF Caseloads, SSI-S Recipients, and Medicaid Enrollees*: These are measured as the percentage of state annual TANF caseloads in total female population aged 15-44, the percentage of state SSI-S recipients in state total population, and the percentage of state Medicaid enrollees in state total population. For these variables only, I include both a one-year lag and a two-year lag in the models to see whether there are delayed effects. *Federal Share*: This variable is measured as the percentage of federal contribution in total program expenditures. It is expected that additional federal dollars induce states and especially poorer state to put more financial resource on welfare programs and thereby increase welfare efforts or generosity although it is not always the case (Bailey & Rom, 2004; Barrilleaux et al., 2002; Matsubayashi & Rocha, 2012).

Lastly, I have a few demographic factors. *African-American* and *Hispanic*: These two variables measure the proportion of state population that is African-American and

Hispanic, respectively. Previous studies find a backlash effect when the presence of these minority groups in total population is greater (Barrilleaux & Bernick, 2003; Matsubayashi & Rocha, 2012; Preuhs, 2007; Soss et al., 2001; Wright, 1977). *Poverty*: This is the percentage of state population living below the federal poverty level. States with a higher poverty rate might be more generous as policymakers react to the increased demand, but they could also make policy less generous in an effort to discourage welfare dependency (Fellowes & Rowes, 2004; Soss et al., 2001). *Elderly*: This indicates the percentage of people over 65 in the state population. This variable is included in SSI-S and Medicaid models. As senior citizens are politically more active, they are likely to influence the generosity of welfare policies from which they benefit. *Disability*: It measures the percentage of people with working disabilities in state population and is included in SSI-S and Medicaid models. *Children*: This is the percentage of people under 18 in state population. It is included in the Medicaid model only. *Single Mother Household* and *Non-Marital Birth*: The former measures the percentage of households led by a single mother, and the latter indicates the percentage of births out-of-wedlock. They are only included in the TANF model to see whether state policymakers make welfare policy less generous as a means to punish growing immoral behavior (Soss et al., 2001).

Since the dependent variables use fiscal year data, I use a one-year lag for all independent variables. For *TANF Caseloads*, *SSI-S Recipients and Medicaid Enrollees*, however, each model has a two-year lag in addition to a one-year lag. Tweedie (1994) finds that an increase in the proportion of AFDC recipients in a state from two years prior lowers the change in AFDC benefit levels, suggesting that policymakers' response might not be immediate (Peterson & Rom, 1989). Based on this finding, I include a two-year lag of caseload variable in each model to take into account the possibility of delayed effects on welfare generosity. All dollar terms are adjusted to 2010 (TANF and Medicaid) or 2004 (SSI-S) constant U.S. dollars using the state Consumer Price Index developed by Carrillo, Early, and Olsen (2014). Table 4.1 through Table 4.3 presents the descriptive statistics of variables used in the models. Details on all dependent and independent variable measures and sources of the data are summarized in Table C.2 in the Appendix C.

Table 4.1 Descriptive Statistics of Variables in TANF Generosity Model for FY 1999-FY 2010

Variable	Unit	Obs	Mean	S.D	Min	Max
TANF Generosity	$	588	94.51	143.16	-377.32	1,596.67
L. Inter-Party Competition	0.5-1	588	0.88	0.09	0.64	1
L. Electoral Competition	0-100	588	38.71	11.05	12.05	63.10
L. Unified Democratic Control	0/1	588	0.27	0.45	0	1
L. Unified Republican Control	0/1	588	0.26	0.44	0	1
L. Government Liberalism	0-100	588	47.83	13.70	17.56	73.62
L. Citizen Liberalism	0-100	588	52.58	15.63	8.45	95.97
L. Unemployment	%	588	5.13	1.64	2.30	13.70
L. Income	Log, $	588	-3.28	0.16	-3.61	-2.77
L. Wage	Log, $	588	10.60	0.12	10.35	10.89
L. TANF Caseloads	%	588	36.54	18.70	3.05	114.92
L2. TANF Caseloads	%	588	39.58	20.91	3.05	134.36
L. Federal Share	%	588	63.54	11.66	4.38	171.06
L. African-American	%	588	10.50	9.60	0.31	37.08
L. Hispanic	%	588	8.88	9.39	0.54	46.03
L. Single Mother Household	%	588	5.27	0.99	2.95	8.67
L. Non-Marital Birth	%	588	35.42	6.60	16.70	55
L. Poverty	%	588	11.91	3.14	4.50	23.10

Note: The statistics are for 49 states excluding Nebraska. All independent variables are lagged by one year except *L2. TANF Caseload* which is lagged by two years.

Table 4.2 Descriptive Statistics of Variables of SSI-S Generosity Model for FY 2002-FY 2004

Variable	Unit	Obs	Mean	S.D	Min	Max
SSI-S Generosity	$	141	1,712.50	1,925.24	0	11,616.02
L. SSI-S Generosity	$	141	1,615.95	1,724.24	0	11,616.02
L. Inter-Party Competition	0.5-1	141	0.88	0.09	0.64	1
L. Electoral Competition	0-100	141	37.47	10.70	16.73	58.01
L. Unified Democratic Control	0/1	141	0.23	0.42	0	1
L. Unified Republican Control	0/1	141	0.25	0.43	0	1
L. Government Liberalism	0-100	141	47.07	13.39	23.74	71.84
L. Citizen Liberalism	0-100	141	49.71	15.46	8.45	95.97
L. Income	Log, $	141	-3.30	0.16	-3.55	-2.85
L. Wage	Log, $	141	10.61	0.12	10.40	10.87
L. Unemployment	%	141	5.20	1.06	3.10	8.10
L. SSI-S Recipients	%	141	0.80	1.02	0.00	3.30
L2. SSI-S Recipients	%	141	0.83	1.02	0.00	3.25
L. Federal Share	%	141	90.58	13.73	1.00	100
L. African-American	%	141	10.57	9.72	0.35	36.48
L. Hispanic	%	141	8.75	9.30	0.73	43.54
L. Disability	%	141	7.89	1.97	4.70	14.90
L. Elderly	%	141	12.43	1.84	5.90	17.32
L. Poverty	%	141	11.62	3.19	5.80	19.80

Note: The statistics are for 47 states excluding Nebraska, Missouri, and North Dakota. All independent variables are lagged by one year except *L2. SSI-S Recipients* which is lagged by two years.

Table 4.3 Descriptive Statistics of Variables of Medicaid Generosity Model for FY 2002-FY 2010

Variable	Unit	Obs	Mean	S.D	Min	Max
Medicaid Generosity	$	441	2,334.41	947.84	778.41	5,039.19
L. Inter-Party Competition	0.5-1	441	0.88	0.08	0.64	1.00
L. Electoral Competition	0-100	441	38.46	11.38	12.05	63.10
L. Unified Democratic Control	0/1	441	0.28	0.45	0	1
L. Unified Republican Control	0/1	441	0.25	0.43	0	1
L. Government Liberalism	0-100	441	48.35	13.68	17.56	73.62
L. Citizen Liberalism	0-100	441	54.09	15.64	8.45	95.97
L. Nursing Homes	Per 100k	441	6.42	3.05	1.81	15.89
L. Hospitals	Per 100k	441	2.26	1.36	0.63	6.71
L. Doctors	Per 100k	441	254.48	62.25	156.37	479.50

Table 4.3 (continued)

Variable	Unit	Obs	Mean	S.D	Min	Max
L. Income	Log, $	441	-3.26	0.15	-3.55	-2.77
L. Wage	Log, $	441	10.61	0.12	10.39	10.89
L. Unemployment	%	441	5.38	1.65	2.60	13.70
L. Medicaid Enrollees	%	441	17.41	5.04	7.33	35.13
L2. Medicaid Enrollees	%	441	16.89	4.99	6.84	35.13
L. Federal Share	%	441	60.28	8.33	50	77.08
L. African-American	%	441	10.53	9.59	0.35	37.08
L. Hispanic	%	441	9.32	9.53	0.73	46.03
L. Disability	%	441	8.13	2.05	4.50	16.20
L. Elderly	%	441	12.68	1.75	5.90	17.32
L. Children	%	441	24.69	1.79	20.88	31.83
L. Poverty	%	441	12.06	3.13	5.40	23.10

Note: The statistics are for original variables, not differenced variables, covering 49 states excluding Nebraska. All independent variables are lagged by one year except *L2. Medicaid Enrollees* which is lagged by two years.

4.6 Results

4.6.1 Party Politics Variables

Table 4.4 presents the coefficients for party politics variables across the three welfare programs. Overall, the results show that the importance of these variables varies across the programs. First, there is no significant independent effects from inter-party competition and electoral competition in all three generosity models, which fails to provide support for Hypothesis 1. However, the interaction term between inter-party competition and citizen ideology is statistically significant in an expected direction in the SSI-S model, and the interaction term between electoral competition and citizen ideology is statistically significant in an expected direction in the Medicaid model, while both are not significant predictors of TANF generosity. In the SSI-S model, the interaction between inter-party competition and citizen liberalism is positively signed and statistically significant ($p<0.10$). It indicates that citizen ideological preferences conditions the impact of inter-party competition in a way that the impact on SSI-S generosity increases as citizens become more liberal. In the Medicaid model, the interaction between electoral competition and citizen liberalism is positively signed and statistically significant ($p<0.05$). It means that that the influence from electoral competition on Medicaid generosity is augmented as state citizens lean toward a more liberal side of the political spectrum. Therefore, the results provide partial support for Hypothesis 2.

Table 4.4. Results for Party Politics Variables Across Three Welfare Policies

Party Politics Variable	TANF	SSI-S	Medicaid
Inter-Party Competition * Citizen Liberalism	0.09	219.35*	16.42
	(2.74)	(129.44)	(16.64)
Electoral Competition * Citizen Liberalism	0.01	-1.84	0.23**
	(0.03)	(1.43)	(0.11)
Unified Democratic Control	-29.78**	1,436.75**	-12.02
	(12.38)	(514.00)	(43.22)
Unified Republican Control	20.4	-428.63	84.63*
	(17.27)	(396.77)	(51.27)
Inter-Party Competition	-24.24	-8,785.18	-51.03
	(165.43)	(7,194.39)	(1,034.80)
Electoral Competition	-2.63	41.81	-11.08
	(1.81)	(74.54)	(7.75)

Note: ***p<0.01, ** p<0.05, *p<0.10

Next, unified Democratic control is statistically significant in TANF and SSI-S models, but it exerts influence in an opposite direction in the two models ($p<0.05$). A state with full Democratic control is likely to be less generous in TANF program but more generous in SSI-S program than a state with different partisan composition of a state government, taking everything else into account. These results fail to provide support for Hypothesis 3-1 which posits that Democrats' full control over the state government will lead to more generous welfare policy regardless of the deservingness of target populations. Meanwhile, unified Republican control is statistically significant and positive only in the Medicaid model, meaning that states tend to have more generous Medicaid policy under the full Republican control. This is consistent with Hypothesis 3-2 with regard to Medicaid generosity. Overall, the results provide partial support for Hypothesis 3-1 and 3-2.

4.6.2 Other Variables

Table 4.5 through Table 4.7 reports the estimates for all independent variables from TANF, SSI-S, and Medicaid generosity models. A few other variables explain the generosity of TANF programs. First, government liberalism exerts a positive impact on TANF generosity ($p<0.10$); state governments with a more liberal ideology have more generous TANF programs than state governments with a more conservative ideology. Also, the percentage of TANF caseloads from the previous year has statistically significant and negative effect ($p<0.10$), while that from two years prior has statistically significant and positive effect on TANF generosity ($p<0.05$). Concerned with welfare dependency, policymakers might make TANF policy less generous as TANF caseloads from the previous year increases. The positive effect of TANF caseloads from two years prior seems puzzling, and further investigation is needed for better understanding of the phenomenon. Federal share is a statistically significant, positive predictor of state's TANF generosity ($p<0.10$). A greater percentage of federal money in TANF total expenditures induces states to become more generous. Among demographic variables, single mother household has statistically significant and negative impact on TANF generosity ($p<0.05$). A state with a higher percentage of single mother headed household tends to be less generous in TANF programs, which is consistent with a social construction interpretation. Negatively constructed images of single mothers seems to affect policymaking to result in TANF policy unfavorable to the TANF recipients. Meanwhile, the coefficient of African-American is statistically significant and negative, indicating that there is a backlash effect ($p<0.10$).

In the SSI-S model, unemployment rate is a statistically significant and negative predictor of SSI-S generosity ($p<0.10$). Rather than increasing generosity of SSI-S policy by providing a greater supplemental benefit per recipient under stronger economy, states seem to become less generous pushing people to find ways to support themselves in the market. For Medicaid, the rate of nursing homes exerts statistically significant and negative influence on the generosity of Medicaid ($p<0.01$). Also, the percentage of Medicaid enrollees from the previous year exerts significant, positive influence on Medicaid generosity ($p<0.01$). Unlike in the case of TANF policymaking where the generosity of the program decreases as the previous year's TANF caseloads increases, policymakers seem to response to greater needs of medical services by increasing Medicaid generosity.

Table 4.5 Determinants of State TANF Generosity, FY 1999-FY 2010

Independent Variable	Coefficient	Standard Error
Inter-Party Competition * Citizen Liberalism	0.09	2.74
Electoral Competition * Citizen Liberalism	0.01	0.03
Unified Democratic Control (0/1)	-29.78**	12.38
Unified Republican Control (0/1)	20.40	17.27
Inter-Party Competition (0.5-1)	-24.24	165.43
Electoral Competition (0-100)	-2.63	1.81
Government Liberalism (0-100)	0.87*	0.49
Citizen Liberalism (0-100)	-0.01	2.79
Income (log, $)	140.09	129.40
Wage (log, $)	639.11	477.09
Unemployment (%)	-0.01	6.34
TANF Caseloads (%)	-1.95*	1.11
TANF Caseloads$_{t-2}$ (%)	2.29**	1.15
Federal Share (%)	5.59*	3.02
African-American (%)	-29.17*	17.65
Hispanic (%)	2.69	6.00
Single Mother Household (%)	-10.40**	5.29
Non-Marital Birth (%)	-1.39	3.09
Poverty (%)	-0.15	1.95
Constant	-6,077.15	5,110.96
Observations	588	
Number of States[a]	49	
Number of Years	12	

Note: Presented are estimates from the fixed effects model with state and year fixed effects using clustered standard errors. All independent variables are lagged by one year except the second *TANF Caseloads* which is lagged by two years as denoted by a subscript *t-2*. ***p<0.01, ** p<0.05, *p<0.10
a. Nebraska is excluded because it has a non-partisan state legislature.

Table 4.6 Determinants of State SSI-S Generosity, FY 2002-FY 2004

Independent Variable	Coefficient	Standard Error
Lagged Dependent Variable ($)	0.42	0.38
Inter-Party Competition * Citizen Liberalism	219.35*	129.44
Electoral Competition * Citizen Liberalism	-1.84	1.43
Unified Democratic Control (0/1)	1,436.75***	514.00
Unified Republican Control (0/1)	-428.63	396.77
Inter-Party Competition (0.5-1)	-8,785.18	7,194.39
Electoral Competition (0-100)	41.81	74.54
Government Liberalism (0-100)	0.43	14.96
Citizen Liberalism (0-100)	-98.23	123.91
Income (log, $)	-7,021.07	6,421.83
Wage (log, $)	5,022.57	9,622.83
Unemployment (%)	-444.45*	239.91
SSI-S Recipients (%)	-1,138.77	815.89
SSI-S Recipients$_{t-2}$ (%)	763.09	1,187.64
Federal Share (%)	5.95	12.11
African-American (%)	1,161.56	1,011.65
Hispanic (%)	-19.15	422.66
Disability (%)	85.70	89.51
Elderly (%)	-53.95	1,042.94
Poverty (%)	53.81	76.20
Constant	-81,516.36	111,085.70
Observations	141	
Number of States[a]	47	
Number of Years	3	
Arellano-Bond Test (order 1)	0.08	
Arellano-Bond Test (order 2)	0.43	
Sargan Test (p-value)	0.99	

Note: The table reports Arellano-Bond dynamic panel data estimates with the year fixed effects and the conventional gmm standard error. All independent variables are lagged by one year except the second *SSI-S Recipients* which is lagged by two years as denoted by a subscript *t-2*. The statistic from Arellano-Bond test (order 2) shows that there is no serial correlation in the residuals of order 2. The p-value of the Sargan test indicates that conditions for overidentifying restrictions are met. ***$p<0.01$, ** $p<0.05$, *$p<0.10$
a. Nebraska is excluded because it has a non-partisan state legislature. Missouri and North Dakota are excluded due to inconsistency in reporting of their SSI-S payment data.

Table 4.7 Determinants of Medicaid Generosity, FY 2002-FY 2010

Independent Variable	Coefficient	Standard Error
Inter-Party Competition * Citizen Liberalism	16.42	16.64
Electoral Competition * Citizen Liberalism	0.23**	0.11
Unified Democratic Control (0/1)	-12.02	43.22
Unified Republican Control (0/1)	84.63*	51.27
Inter-Party Competition (0.5-1)	-51.03	1,034.80
Electoral Competition (0-100)	-11.08	7.75
Government Liberalism (0-100)	1.93	1.98
Citizen Liberalism (0-100)	-24.38	15.27
Nursing Homes (per 100k)	-198.56***	73.22
Hospitals (per 100k)	23.54	144.25
Doctors (per 100k)	-0.01	1.87
Income (log, $)	281.24	628.99
Wage (log, $)	-751.86	1,358.44
Unemployment (%)	-21.78	20.37
Medicaid Enrollees (%)	31.89***	10.97
Medicaid Enrollees$_{t-2}$ (%)	-4.39	5.60
Federal Share (%)	-6.34	9.74
African-American (%)	50.80	50.16
Hispanic (%)	-18.21	56.25
Disability (%)	-5.22	10.36
Elderly (%)	-41.64	171.10
Children (%)	-6.55	118.75
Poverty (%)	-1.89	8.06
Constant	100.43**	46.19
Observations	441	
Number of States[a]	49	
Number of Years	9	

Note: Presented are estimates from the first difference model with year dummies using clustered standard errors. All independent variables are lagged by one year except the second *Medicaid Enrollees* which is lagged by two years as denoted by a subscript *t-2*. ***p<0.01, ** p<0.05, *p<0.10
a. Nebraska is excluded because it has a non-partisan state legislature.

4.7 Discussion and Conclusion

In this study, I analyze three welfare policies serving different target populations to examine whether the nuance of state welfare politics differs across the policies. By examining state welfare generosity across three different programs after the 1996 welfare reform, this study provides a valuable update and extension to the old debate regarding party politics and its relationship to welfare policymaking. On the one hand, the results from TANF, SSI-S, and Medicaid generosity models largely resonate the findings from earlier period in that they show party politics play an important role in explaining welfare generosity across states. This study finds that partisan control makes a difference for welfare generosity, but its effect for welfare policies targeting the deserving poor is opposite to its effect for policies targeting the undeserving poor. While I expect that unified Democratic control will have positive influence on both TANF and SSI-S generosity, it turns out that it has a positive effect on SSI-S generosity but a negative effect on TANF generosity. The finding on TANF generosity echoes that of Fellowes and Rowes (2004) and Barilleaux and Bernick (2003). Fellowes and Rowes (2004) find that a state with greater presence of Democrats in state legislatures tends to provide a lower level of TANF cash benefits, whereas Barilleaux and Bernick (2003) show that stronger presence of Democrats in a state's lower house decreases per capita GA spending. While it is difficult to explain these unexpected findings of the earlier studies, it is probable that this study finds the negative effect of unified Democratic control because full Democratic control provides more access to TANF but the rate of spending increase does not outpace that of recipients for some reason. Note that this study uses the TANF generosity measure constructed from state TANF spending on assistance as oppose to total state TANF spending. If total state TANF spending is considered, the finding of this partisan control variable may or may not change. However, the reason behind this unexpected result must remain open, given that TANF caseload data are collected only for individuals receiving TANF assistance. Meanwhile, the significant and positive, albeit relatively weak, effect of unified Republican control on Medicaid generosity is consistent with what previous studies suggest. It is likely that full Republican control leads to a decrease in the number of enrollees due to preference for less access to Medicaid, which in turn could results in more spending per enrollees (Bailey & Rom, 2004; Kronebusch, 1993).

On the other hand, the findings of this study offer an important point of departure from the previous literature in thinking about how party competition is linked to welfare generosity. This study provides a theoretical refinement by showing that party competition plays a role only when it is interacted with citizen liberalism; there are a significant and positive joint effect of inter-party competition and citizen liberalism and that of electoral competition and citizen liberalism on welfare generosity, whereas inter-party competition and electoral competition do not exert an independent influence. Interestingly, this study shows that a different measure of party competition has a significant conditioned impact on SSI-S and Medicaid, respectively; inter-party competition affects SSI-S generosity jointly with citizen liberalism, while electoral competition is important in explaining Medicaid generosity when it is interacted with citizen liberalism. Given that previous studies investigate these party competition variables only one at a time, it requires further examination to understand why different party competition measures affect different welfare policies. Meanwhile, the results show that TANF generosity is not susceptible to any party competition variables including the interaction terms, which is unexpected given the finding of Barrilleaux and Bernick (2003). One might conceive that the fact that work requirements became one of the signature attributes of TANF programs unlike the predecessor—i.e., AFDC—from the pre-welfare reform era might change the way policymakers and the public perceive the deservingness of TANF recipients, and thus weaken the linkage between party competition and TANF generosity.

Overall, the findings lead to the conclusion that party politics is an important factor explaining the generosity of state welfare policy, especially where welfare policy for the deserving poor and mixed population is concerned. Despite these findings, some cautionary notes should be sounded. First, different findings across the three generosity models might be resulting from employing a different estimation technique for each model. Although I follow the appropriate processes in choosing estimation methods, we cannot zero out the possibility that findings would change if the same estimation technique is applied to the three models. Second, limitations in TANF expenditure data suggests caution in interpreting the results of the TANF generosity model. Since states can make changes to previous TANF expenditure reports, there are occasions that reported spending does not correctly reflect actual spending of a given fiscal year. As a result, TANF expenditure data includes negative or zero values. In fact, the TANF generosity measure includes 11 negative values and 18 zero values due to this accounting practices, and treating these observations as missing yields slightly different results from what I discuss earlier. The fact that the TANF data I use in this study is the only source available across states suggests that there is a need for better data collecting practices. Third, using different time periods for the different programs might affect the empirical results, which creates concerns regarding comparability across the three programs. Due to data availability, this study uses a much shorter period of time in examining SSI-S generosity compared to the other two policies. It is reasonable to think that variability would be less in a shorter period than in a longer period, so utilizing variability in a shorter period can reduce the chance of detecting significant results.

Additional research is needed to investigate different dimensions of generosity across different welfare policies in the post-welfare reform era. Scholars have produced extensive research on state welfare politics since the passage of PRWORA, but the scholarship exclusively focuses on investigating eligibility generosity or sanctions (Fellowes & Rowes, 2004; Lukens, 2014; Soss et al., 2001) and interests in other dimensions of generosity seems to have faded away. However, as shown in earlier studies, broadening the scope of scrutiny to include different welfare policies and different measures can help us detect subtle but meaningful differences in welfare politics, which eventually enriches our understanding of who gets what and why in the post-welfare reform era. Another path that future studies can take is to reconsider traditional views on the working of various political factors and make an effort to uncover the mechanism through which these factors produce welfare generosity outputs. As suggested by a few studies (Barrilleaux et al., 2002; Häusermann, Picot, & Geering, 2013), for example, parties may interact with other components of the political environment or institutions to bring about change in state welfare generosity.

CHAPTER 5

CONCLUDING REMARKS

This chapter is devoted to explain connections between the empirical results from Chapter 3 and Chapter 4 and discuss pathways for future analysis. The two studies in these chapters look at different dimensions of state welfare policy and they show some commonalities and discrepancies in their results, especially regarding political forces. In general, partisan control plays a role to influence both welfare commitment and generosity at the state level. Except for the case where state welfare commitment is narrowly defined, whether Democrats (or Republicans for Medicaid generosity) have full control over the state government increases states' willingness to devote their financial resources for public welfare purposes and the degree of generosity to recipients of welfare benefits. On the other hand, the two studies find that citizens' ideological orientation is associated with neither commitment nor generosity. Although citizen liberalism moderates the effect of either inter-party competition or electoral competition in two generosity models (i.e., SSI-S and Medicaid generosity), it does not have an independent effect on the generosity. Similarly, the studies do not find a statistically significant effect of electoral competition in commitment and generosity models except for the Medicaid generosity model. Electoral competition is only meaningful when it is interacted with citizen liberalism in the Medicaid model.

Meanwhile, inter-party competition and government liberalism seem to exert influence on welfare commitment, but they do not matter much for welfare generosity. Inter-party competition has the impact of increasing state welfare commitment, albeit with different degree, regardless of the commitment measure used. However, this same variable matters only when it is conditioned by citizen ideology in the SSI-S generosity model. I reach a similar conclusion when it comes to the effect of government ideology. Government liberalism leads to an increase in welfare commitment no matter how I define welfare, but the only generosity model for which it shows the expected impact is the TANF model.

Comparison across the results from state welfare commitment and generosity models raise some questions that could be further examined in the future studies. First of all, future research that provides theoretical underpinnings as to why some political variables explain state welfare commitment but not generosity and vice versa will be valuable. For example, inter-party competition is shown to have predicting power when it comes to welfare commitment but not welfare generosity at least when the independent effect of inter-party competition is concerned. The findings from SSI-S and Medicaid generosity models that show the effect of inter-party being conditioned by citizen ideology suggest one of the possibilities as to why we observe this discrepancy. One might suspect that omission of the interaction term between inter-party competition and citizen liberalism may lead to different findings with regard to these two factors. Whether it is the matter of modeling or there are indeed fundamental differences in underlying mechanisms in which these political variable works can be further tested.

Next, future efforts could focus on investigating similar questions addressed in Chapter 4 with different measures of welfare generosity. The studies in Chapter 3 and Chapter 4 suggest that different political forces might come into play when other dimensions of the generosity of state welfare policy are taken into account. For example, welfare generosity can be measured to reflect the extent to which a welfare policy provides access to its benefits and services. Comparing results from examining different dimensions of welfare generosity would help disentangling the puzzles of differential effects of political variables examined in these studies.

Lastly, further empirical tests that aim to uncover the effect of 1996 welfare reform on state welfare policies will provide better understanding of welfare politics in the post-welfare reform era. Scholars have taken the opportunity that the passage of PRWORA created through the devolution of policy making power to states, which leads to many studies focusing on variation in state welfare policy since 1996. While previous studies draw on studies from the pre-welfare reform era, there is little attention to whether the politics of welfare policy in American states actually has changed since the 1996 welfare reform. The PRWORA is viewed as the legislation that substantially reconstructed the U.S. welfare system, but little is known what changes the welfare reform brought about to the landscape of welfare policy making across states. It is possible that both states' greater discretion over designing and implementing welfare programs and an emphasis on welfare-to-work change the political environment in which various factors interact to produce policy outputs. A few studies that show the effects of changes in social policy on political behavior suggest a possible pathway for political effects that is worth exploring (Clinton & Sances, 2018; Lerman, Sadin, & Trachtman, 2017; Soss, 1999). Therefore, empirical studies comparing pre-1996 with post-1996 will contribute to our understanding of welfare policy making that is more relevant to the current policy environment. All future pathways for research suggested above will provide theoretical refinement and advancement in the literature, which will, in turn, serve as a sounder theoretical underpinning for future studies to come.

APPENDICES

APPENDIX A. SUPPLEMENTS FOR CHAPTER 2

Table A.1 Correlation Between Independent Variables

	State TANF Policy	Female Legislators	Citizen Liberalism	Government Liberalism	Unemployment Rate	Unwed Birth Rate	Poverty Rate	African-American Recipients	Hispanic Recipients	TANF Caseload Change	CCDF Spending
State TANF Policy	1.00										
Female Legislators	0.01	1.00									
Citizen Liberalism	0.09	0.44	1.00								
Government Liberalism	-0.06	0.38	0.65	1.00							
Unemployment Rate	0.09	0.01	-0.02	0.07	1.00						
Unwed Birth Rate	0.11	-0.22	0.07	-0.00	0.37	1.00					
Poverty Rate	0.00	-0.33	-0.28	-0.18	0.48	0.66	1.00				
African-American Recipients	0.34	-0.34	-0.12	-0.06	0.22	0.47	0.28	1.00			
Hispanic Recipients	-0.17	0.34	0.12	0.07	0.11	0.00	0.11	-0.29	1.00		
TANF Caseload Change	-0.09	0.13	0.05	0.21	0.28	-0.13	-0.04	-0.12	0.03	1.00	
CCDF Spending	-0.00	0.11	0.16	0.13	0.13	0.01	0.03	0.11	0.40	0.02	1.00

Note: Correlation values are rounded to the second decimal number.

Table A.2 Results from Different Treatment of Negative Values of the Dependent Variables [a]

Variables	As is	Winsor	Trim
Interaction			
Female Legislators * TANF Policy	-0.38***	-0.37***	-0.26**
	(0.13)	(0.12)	(0.11)
Government Policy			
State TANF Policy	8.47***	8.30***	6.76**
	(2.87)	(2.73)	(2.69)
Political Factors			
Female Legislators	0.27**	0.30***	0.26**
	(0.12)	(0.11)	(0.11)
Citizen Liberalism	0.12**	0.13***	0.13***
	(0.05)	(0.05)	(0.05)
Government Liberalism	0.09***	0.08***	0.07***
	(0.03)	(0.03)	(0.03)
Socio-economic Factors			
Unemployment Rate	-0.55*	-0.57**	-0.62**
	(0.30)	(0.28)	(0.28)
Unwed Birth Rate	-0.16	-0.17	-0.12
	(0.23)	(0.22)	(0.22)
Poverty Rate	0.19	0.12	0.10
	(0.23)	(0.21)	(0.21)
African-American Recipients	0.04	0.06	0.07
	(0.11)	(0.11)	(0.11)
Hispanic Recipients	0.35***	0.34***	0.34***
	(0.11)	(0.11)	(0.10)
Controls			
TANF Caseload Change	-0.03	-0.03	-0.04
	(0.03)	(0.02)	(0.02)
CCDF Spending [b]	6.85e-09***	6.26e-09***	5.57e-09**
	(2.53e-09)	(2.35e-09)	(2.23e-09)
Constant	-0.45	-0.85	-1.50
	(12.46)	(12.06)	(11.79)
Observations	650	650	637[c]
R-squared	0.84	0.85	0.84

Note: Standard errors in parentheses. ***p<0.01, **p<0.05, *p<0.10

a. This table shows estimators from using three different data sets: negative values are (1) included as they are, (2) winsorized, and (3) truncated at 1 and 99 percentiles, respectively. I conduct a robustness check to insure that treating the nine negative values differently do not change the main results. The results for all the variables remain the same in terms of their statistical significance and the direction of the impact.

b. The coefficients for *CCDF Spending* are statistically significant at the 1% level for first two models and at the 5% level for the last model, but their size is minuscule. Therefore, it is reasonable to interpret the result that CCDF Spending does not have a substantive marginal effect on *TANF Child Care Spending*.

c. By trimming extreme values of the dependent variable at 1 and 99 percentiles, thirteen observations were deleted.

APPENDIX B. SUPPLEMENTS FOR CHAPTER 3

B.1 Post-Estimation Diagnostic Tests for the Arellano-Bond

One should pass two post-estimation diagnostic tests to validate the use of the Arellano-Bond estimator. First one is the Arellano-Bond test for autocorrelation. It tests the null hypothesis that there is no autocorrelation of order 1 and order 2 (test separately). For the instruments in the Arellano-Bond to work, the differenced unobserved time-invariant error term should be unrelated to the second lag of the dependent variable and the lags thereafter—i.e., the order greater than 1. If this is not the case, we have endogeneity problem. Therefore, it is required that we fail to reject that there is no autocorrelation of order 2. Second one is the Sargan test of overidentifying restrictions. It has a null hypothesis that the instruments as a group are valid, i.e., uncorrelated with the error term (exogenous). Therefore, we should fail to reject this hypothesis for the instruments in the Arellano-Bond to be valid.

Table B.1 are the results from performing the diagnostic tests for each of the three models using a different dependent variable. For all three models, condition for no autocorrelation of order 2 is met as we cannot reject the null hypothesis of zero autocorrelation of order 2. However, the results from the Sargan test indicate that the instruments used in all models are not exogenous. It turns out that the three dependent variables in each model are so highly correlated individually over time that the Arellano-Bond estimators fail the test of instrument variables being uncorrelated with error terms. Regressing the dependent variables on a one-year lagged dependent variable for the period examined shows that about 94-96% of variance in the dependent variable is explained by the lagged dependent variable in all of the three models. Therefore, the Arellano-Bond is not an acceptable method of estimation for this study.

Table B.1 Arellano-Bond Post-Estimation Diagnostic Tests

	Model 1 (Census Measure)	Model 2 (Comprehensive Measure 1)	Model 3 (Comprehensive Measure 2)
AB test that autocorrelation of order 1 is zero (Pr>z)	0.01	0.00	0.00
AB test that autocorrelation of order 2 is zero (Pr>z)	0.55	0.98	0.83
Sargan test of overidentifying restrictions (p-value)	0.02	0.01	0.02

Table B.2 Variable Definitions and Sources of Data

Variable	Measure	Source
State Welfare Commitment (Model 1)	Log of per capita total state welfare expenditures, corresponding to Census measure; constant 2010 U.S. dollar	Pierson K., Hand M., and Thompson F. (2015). The Government Finance Database: A Common Resource for Quantitative Research in Public Financial Analysis. U.S. Census Bureau. (1998, 1999). State & Local Government Finance Historical Datasets and Tables (for FY 1998 and FY 1999).
State Welfare Commitment (Model 2)	Log of per capita total state welfare expenditures, corresponding to Comprehensive measure 1; constant 2010 U.S. dollar	
State Welfare Commitment (Model 3)	Log of per capita total state welfare expenditures, corresponding to Comprehensive measure 2; constant 2010 U.S. dollar	
Unified Democrat Control	A dummy variable indicating whether both the executive and legislative branches are controlled by Democrats	Klarner, C. (2013b). State Partisan Balance Data, 1937 - 2011.
Unified Republican Control	A dummy variable indicating whether both the executive and legislative branches are controlled by Republicans	Klarner, C. (2013b). State Partisan Balance Data, 1937 - 2011.
Inter-Party Competition	Folded Ranney (1976) index indicating the degree of party control of, and competition between two parties for control of a state government	Klarner, C. (2013a) Other Scholars' Competitiveness Measures.
Electoral Competition	Holbrook & Van Dunk (1993) index indicating the average of legislative district-level electoral competition in a state	Klarner, C. (2013a) Other Scholars' Competitiveness Measures.

Table B.2 (continued)

Variable	Measure	Source
Government Liberalism	Berry et al. (2010) measure of government ideology indicating the relative liberalism of a state government	Berry, W. D., Fording, R.C., Ringquist, E. J., Hanson, R. L., & Klarner, C. (2010). Measuring Citizen and Government Ideology in the American States: A Re-appraisal.
Citizen Liberalism	Berry et al. (1998) measure of citizen ideology indicating the relative liberalism of state citizens	Berry, W. D., Ringquist, E. J., Fording, R.C., & Hanson, R. L. (1998). Measuring Citizen and Government Ideology in the American States, 1960-93.
Income	Log of per capita state personal income; 2010 constant U.S dollar	U.S. Bureau of Economic Analysis, U.S. Department of Commerce
Unemployment	Percentage of state labor force who are unemployed	U.S. Bureau of Labor Statistics
Elderly	Percentage of state population who are 65 year old and above	U.S. Census Bureau
African-American	Percentage of state population that is African-American	U.S. Census Bureau
Hispanic	Percentage of state population that is Hispanic	U.S. Census Bureau
Poverty	Percentage of state population living below the federal poverty level	U.S. Census Bureau
Federal Aid 1 (Model 1)	Log of per capita total federal aid transferred to a state, corresponding to Census measure; includes federal aid for TANF, Medicaid, care in nursing homes, child welfare services, social and community services block grants, etc.; 2010 constant U.S. dollar	Pierson K., Hand M., and Thompson F. (2015). The Government Finance Database: A Common Resource for Quantitative Research in Public Financial Analysis.
Federal Aid 2 (Model 2)	Log of per capita total federal aid transferred to a state, corresponding to Comprehensive measure 1; includes Federal Aid 3 plus federal aid for migrant and bilingual education, Indian education, Head Start program, federal grants for school nutrition and milk programs, grants and contractual amounts received by higher education institutions; 2010 constant U.S. dollar	

Table B.2 (continued)

Variable	Measure	Source
Federal Aid 3 (Model 3)	Log of per capita total federal aid transferred to a state, corresponding to Comprehensive measure 2; includes Federal Aid 1 plus federal aid for administration of the cooperative Federal-state unemployment compensation system, public employment offices and related services, and veterans' readjustment allowances, and determination of eligibility for Social Security disability benefits; 2010 constant U.S. dollar	Pierson K., Hand M., and Thompson F. (2015). The Government Finance Database: A Common Resource for Quantitative Research in Public Financial Analysis.

Table B.3 Correlations

(1) Between Dependent Variables in State Welfare Commitment Models

	Census Measure	Comprehensive Measure 1	Comprehensive Measure 2
Census Measure	1.00	—	—
Comprehensive Measure 1	0.90	1.00	—
Comprehensive Measure 2	0.95	0.94	1.00

Note: Correlation values are rounded to the second decimal number

(2) Between Independent Variables

	Unified Dem. Control	Unified Rep. Control	Inter-Party Competition	Electoral Competition	Government Liberalism	Citizen Liberalism	Income	Unemployment	Elderly	African-American	Hispanic	Poverty	Federal Aid (Model 1)	Federal Aid (Model 2)	Federal Aid (Model 3)
Unified Dem. Control	1.00														
Unified Rep. Control	-0.36	1.00													
Inter-Party Competition	-0.30	-0.55	1.00												
Electoral Competition	-0.10	0.03	0.05	1.00											
Government Liberalism	0.60	-0.74	0.18	0.07	1.00										
Citizen Liberalism	0.35	-0.31	0.05	0.21	0.51	1.00									
Income	0.07	-0.16	0.18	0.17	0.28	0.53	1.00								
Unemployment	0.06	-0.09	0.04	-0.11	0.11	0.03	-0.10	1.00							
Elderly	0.13	-0.07	-0.04	-0.02	0.14	0.35	-0.05	-0.07	1.00						
African-American	0.14	-0.17	0.14	-0.50	0.09	-0.12	-0.04	0.17	-0.08	1.00					
Hispanic	-0.06	-0.02	0.02	-0.14	-0.03	0.06	0.12	0.14	-0.123	-0.13	1.00				
Poverty	0.06	-0.09	-0.01	-0.42	-0.02	-0.20	-0.57	0.42	0.10	0.34	0.23	1.00			
Federal Aid (Model 1)	0.16	-0.20	0.08	-0.05	0.30	0.27	-0.07	0.35	0.20	0.11	-0.13	0.40	1.00		
Federal Aid (Model 2)	0.15	-0.15	0.01	-0.03	0.26	0.22	-0.10	0.36	0.11	0.06	-0.10	0.40	0.96	1.00	
Federal Aid (Model 3)	0.16	-0.20	0.08	-0.05	0.30	0.27	-0.07	0.35	0.19	0.11	-0.13	0.40	1.00	0.96	1.00

Note: Correlation values are rounded to the second decimal number.

APPENDIX C. SUPPLEMENTS FOR CHAPTER 4

C.1 Post-Estimation Diagnostic Tests for the Arellano-Bond

Table C.1 provides the results from two post-estimation diagnostic tests which validate the use of the Arellano-Bond estimator. First, the Arellano-Bond test for autocorrelation shows whether there is no autocorrelation of order 1 and order 2, respectively. One should fail to reject the null hypothesis that there is no autocorrelation of order 2. If the differenced unobserved time-invariant error term is related to the second lag of the dependent variable and the lags thereafter, we have endogeneity, which indicates that the instruments in the Arellano-Bond would not work. Second, the Sargan test shows whether the instruments are uncorrelated with the error term, and thus valid. One should fail to reject this hypothesis. As shown in the table below, the use of Arellano-Bond estimation is validated only for SSI-S generosity.

Table C.1 Results of Arellano-Bond Post-Estimation Diagnostic Tests

	TANF	SSI-S	Medicaid
AB test: autocorrelation of order 1 is zero (Pr>z)	0.22	0.08	0.01
AB test: autocorrelation of order 2 is zero (Pr>z)	0.25	0.43	0.45
Sargan test of overidentifying restrictions (p-value)	<0.0001	0.99	0.0001

Table C.2 Variable Definitions and Sources of Data

Variable	Measure	Source
TANF Generosity	Per assistance recipient state total TANF assistance expenditures (FY1999-FY2010); constant 2010 U.S. dollar	Administration for Children and Families (ACF), U.S. Department of Health and Human Services
SSI-S Generosity	Per recipient state total SSI-S payments (FY2002-FY2004); constant 2010 U.S. dollar	U.S. Social Security Administration
Medicaid Generosity	Per enrollee state total Medicaid expenditures (FY2002-FY2010); constant 2010 U.S. dollar	Medical Statistical Information System (MSIS) database, Center for Medicare & Medicaid Services
Inter-Party Competition	Folded Ranney (1976) index indicating the degree of party control of, and competition between two parties for control of, a state government folded Ranney (1976) Index	Klarner, C. (2013a) Other Scholars' Competitiveness Measures.
Electoral Competition	Holbrook & Van Dunk (1993) index indication the average of legislative district-level electoral competition in a state	Klarner, C. (2013a) Other Scholars' Competitiveness Measures.
Unified Democratic Control	A dummy variable indicating whether both the executive and legislative branches are controlled by Democrats	Klarner, C. (2013b). State Partisan Balance Data, 1937 - 2011.
Unified Republican Control	A dummy variable indicating whether both the executive and legislative branches are controlled by Republicans	Klarner, C. (2013b). State Partisan Balance Data, 1937 - 2011.
Government Liberalism	Berry et al. (2010) measure of government ideology indicating the relative liberalism of a state government	Berry, W. D., Fording, R.C., Ringquist, E. J., Hanson, R. L., & Klarner, C. (2010). Measuring Citizen and Government Ideology in the American States: A Re-appraisal.
Citizen Liberalism	Berry et al. (2010) measure of citizen ideology indicating the relative liberalism of citizens	Berry, W. D., Ringquist, E. J., Fording, R.C., & Hanson, R. L. (1998). Measuring Citizen and Government Ideology in the American States, 1960-93.
Income	Log of per capita state personal income; constant 2010 U.S. dollar	U.S. Bureau of Economic Analysis, U.S. Department of Commerce
Unemployment	Percentage of state labor force who are unemployed	U.S. Bureau of Labor Statistics
Wage	Log of annual earnings per worker	Bureau of Economic Analysis, U.S. Department of Commerce
Federal Share (TANF)	Percentage of federal contribution in total TANF expenditures	Administration for Children and Families (ACF), U.S. Department of Health and Human Services

Table C.2 (continued)

Variable	Measure	Source
Federal Share (SSI-S)	Percentage of federal contribution in total SSI expenditures	U.S. Social Security Administration
Federal Share (Medicaid)	The rate at which the federal government match state Medicaid expenditures (aka FMAP)	Office of the Assistant Secretary for Planning and Evaluation, Department of Health and Human Services
TANF Caseloads	Percentage of state total annual TANF caseloads in total state female population aged 15-44	U.S. Department of Health and Human Services
SSI-S Recipients	Percentage of state population receiving SSI-S payments	U.S. Social Security Administration
Medicaid Enrollees	Percentage of state population enrolled in Medicaid	Medical Statistical Information System (MSIS) database, Center for Medicare & Medicaid Services
Nursing Homes	The number of nursing homes per 100,000 (100K) residents	Center for Disease Control and Prevention
Hospitals	The number of community hospitals per 100,000 (100K) residents	U.S. Statistical Abstract and Kaiser Family Foundation
Doctors	The number of physicians per 100,000 (100K) residents	U.S. Statistical Abstract
African-American	Percentage of state population that is African-American	U.S. Census Bureau
Hispanic	Percentage of state population that is Hispanic	U.S. Census Bureau
Poverty	Percentage of state population living below the federal poverty level	Center for Poverty Research, University of Kentucky
Single Mother Household	Percentage of single mother headed households in a state	U.S. Census Bureau
Non-Marital Birth	Percentage of births out of wed-lock in a state	Kids Count Data Center
Disability	Percentage of state population who has working disabilities	Disability Statistics, Cornell University
Elderly	Percentage of state population who is 65 and over	U.S. Census Bureau
Children	Percentage of state population who is under 18	Kids Count Data Center

Table C.3. Correlations Between Independent Variables

(1) TANF Generosity Model, FY1999-FY 2010

	Inter-Party Competition	Electoral Competition	Unified Dem. Control	Unified Rep. Control	Government Liberalism	Citizen Liberalism	Income	Wage	Unemployment	TANF Caseloads (t-1)	TANF Caseloads (t-2)	Federal Share	African-American	Hispanic	Single Mother Household	Non-Marital Birth	Poverty
Inter-Party Competition	1.00																
Electoral Competition	0.05	1.00															
Unified Dem. Control	-0.30	-0.09	1.00														
Unified Rep. Control	-0.55	0.03	-0.36	1.00													
Government Liberalism	0.18	0.07	0.60	-0.74	1.00												
Citizen Liberalism	0.05	0.21	0.35	-0.31	0.51	1.00											
Income	0.18	0.17	0.07	-0.16	0.28	0.53	1.00										
Wage	0.19	0.15	0.12	-0.22	0.34	0.51	0.85	1.00									
Unemployment	0.04	-0.11	0.06	-0.09	0.11	0.03	-0.10	0.15	1.00								
TANF Caseloads (t-1)	0.19	0.18	0.15	-0.33	0.38	0.36	0.08	0.29	0.05	1.00							
TANF Caseloads (t-2)	0.18	0.16	0.13	-0.29	0.33	0.32	0.06	0.25	-0.03	0.96	1.00						
Federal Share	-0.10	-0.16	-0.05	-0.12	-0.21	-0.35	-0.55	-0.55	-0.02	-0.16	-0.18	1.00					
African-American	0.14	-0.50	0.14	-0.17	0.09	-0.12	-0.04	0.02	0.17	-0.12	-0.08	0.06	1.00				
Hispanic	0.02	-0.14	-0.06	-0.02	-0.03	0.06	0.12	0.23	0.14	0.11	0.10	-0.06	-0.13	1.00			
Single Mother Household	0.11	-0.33	0.07	-0.14	0.03	-0.14	-0.28	-0.19	0.21	0.09	0.11	0.20	0.50	-0.05	1.00		
Non-Marital Birth	0.18	-0.41	0.10	-0.22	0.18	0.12	-0.12	-0.15	0.37	0.04	0.02	0.10	0.53	0.20	0.49	1.00	
Poverty	-0.01	-0.42	0.06	-0.09	-0.02	-0.20	-0.57	-0.45	0.42	0.05	0.05	0.37	0.34	0.23	0.44	0.58	1.00

Note: All variables except TANF Caseloads (t-2) are lagged by one year. Correlation values are rounded to the second decimal number.

(2) SSI-S Generosity Model, FY 2002-FY 2004

	SSI-S (t-1)	Inter-Party Competition	Electoral Competition	Unified Dem. Control	Unified Rep. Control	Government Liberalism	Citizen Liberalism	Income	Wage	Unemployment	SSI-S Recipients (t-1)	SSI-S Recipients (t-2)	Federal Share	African-American	Hispanic	Disability	Elderly	Poverty
SSI-S (t-1)	1.00																	
Inter-Party Competition	0.22	1.00																
Electoral Competition	0.10	0.10	1.00															
Unified Dem. Control	0.04	-0.28	-0.26	1.00														
Unified Rep. Control	-0.18	-0.53	0.11	-0.32	1.00													
Government Liberalism	0.27	0.21	0.04	0.52	-0.69	1.00												
Citizen Liberalism	0.04	0.17	0.17	0.26	-0.31	0.47	1.00											
Income	0.22	0.27	0.21	-0.04	-0.13	0.25	0.49	1.00										
Wage	0.31	0.25	0.22	0.02	-0.15	0.33	0.48	0.89	1.00									
Unemployment	0.17	0.07	-0.06	0.05	-0.05	0.13	-0.16	-0.20	0.13	1.00								
SSI-S Recipients (t-1)	-0.12	0.10	0.23	-0.02	-0.05	0.24	0.43	0.45	0.50	0.01	1.00							
SSI-S Recipients (t-2)	-0.04	0.08	0.26	0.01	-0.06	0.25	0.45	0.46	0.52	0.03	0.98	1.00						
Federal Share	-0.16	0.09	-0.30	0.13	0.02	-0.16	-0.18	-0.44	-0.49	-0.11	-0.64	-0.62	1.00					
African-American	0.04	-0.14	-0.49	0.28	-0.21	0.21	-0.14	-0.02	0.00	0.16	-0.28	-0.30	0.24	1.00				
Hispanic	-0.06	0.06	-0.06	-0.15	-0.08	0.01	0.05	0.07	0.18	0.22	0.05	0.04	-0.03	-0.16	1.00			
Disability	-0.05	-0.06	-0.15	0.30	-0.13	0.20	-0.11	-0.51	-0.42	0.26	-0.06	-0.06	0.22	0.15	-0.34	1.00		
Elderly	-0.17	-0.05	-0.11	0.10	-0.08	0.04	0.36	-0.04	-0.21	-0.28	0.02	0.03	0.21	-0.06	-0.21	0.28	1.00	
Poverty	-0.13	-0.11	-0.45	0.22	-0.18	0.12	-0.20	-0.66	-0.49	0.40	-0.23	-0.24	0.33	0.33	0.22	0.59	0.11	1.00

Note: All variables except SSI-S Recipients (t-2) are lagged by one year. Correlation values are rounded to the second decimal number.

(3) Medicaid Generosity Model, FY 2002-FY 2010

	Inter-Party Competition	Electoral Competition	Unified Dem. Control	Unified Rep. Control	Government Liberalism	Citizen Liberalism	Nursing Homes	Hospitals	Doctors	Income	Unemployment	Medicaid Enrollees (t-1)	Medicaid Enrollees (t-2)	Federal Match	African-American	Hispanic	Disability	Elderly	Children	Poverty
Inter-Party Competition	1.00																			
Electoral Competition	0.06	1.00																		
Unified Dem. Control	-0.31	-0.06	1.00																	
Unified Rep. Control	-0.52	0.00	-0.36	1.00																
Government Liberalism	0.16	0.08	0.61	-0.74	1.00															
Citizen Liberalism	0.04	0.23	0.35	-0.35	0.53	1.00														
Nursing Homes	-0.10	0.14	-0.10	0.09	-0.08	-0.06	1.00													
Hospitals	-0.23	0.18	-0.18	0.31	-0.25	-0.30	0.74	1.00												
Doctors	0.04	0.04	0.33	-0.30	0.44	0.75	-0.17	-0.43	1.00											
Income	0.16	0.17	0.11	-0.17	0.29	0.52	-0.20	-0.37	0.69	1.00										
Unemployment	0.06	-0.10	0.05	-0.07	0.09	-0.02	-0.26	-0.25	0.00	-0.16	1.00									
Medicaid Enrollees (t-1)	0.08	-0.30	0.15	-0.27	0.28	0.15	-0.11	-0.13	0.09	-0.23	0.28	1.00								
Medicaid Enrollees (t-2)	0.07	-0.29	0.16	-0.25	0.28	0.16	-0.12	-0.12	0.10	-0.21	0.25	0.96	1.00							
Federal Share	-0.23	-0.22	-0.04	0.16	-0.22	-0.44	0.27	0.47	-0.57	-0.88	0.03	0.31	0.31	1.00						
African-American	0.12	-0.52	0.11	-0.13	0.04	-0.14	-0.26	-0.32	0.07	-0.05	0.20	0.28	0.27	0.07	1.00					
Hispanic	-0.03	-0.16	0.00	-0.02	-0.01	0.04	-0.44	-0.37	-0.01	0.10	0.10	0.10	0.09	-0.16	-0.13	1.00				
Disability	0.07	-0.18	0.18	-0.18	0.17	-0.07	0.07	0.13	-0.16	-0.45	0.24	0.50	0.51	0.53	0.22	-0.34	1.00			
Elderly	-0.01	0.01	0.13	-0.16	0.20	0.36	0.46	0.18	0.16	-0.05	-0.07	0.11	0.11	0.14	-0.08	-0.24	0.27	1.00		
Children	-0.14	-0.10	-0.30	0.33	-0.42	-0.60	-0.17	0.03	-0.45	-0.29	-0.00	-0.12	-0.14	0.21	0.04	0.29	-0.31	-0.75	1.00	
Poverty	-0.02	-0.44	0.05	-0.08	-0.02	-0.24	-0.04	0.10	-0.29	-0.60	0.40	0.58	0.56	0.62	0.37	0.21	0.55	0.10	0.07	1.00

Note: The statistics are for original variables, not differenced variables. All variables except Medicaid Enrollees (t-2) are lagged by one year. Correlation values are rounded to the second decimal number.

REFERENCES

Applebaum, L. D. (2001). The influence of perceived deservingness on policy decisions regarding aid to the poor. *Political Psychology*, *22*(3), 419-442.

Arellano, M., & Bond, S. (1991). Some tests of specification for panel data: Monte Carlo evidence and an application to employment equations. *Review of Economic Studies, 58*(2), 277-297.

Atherton, C. R. (1989). The welfare state: Still on solid ground. *Social Service Review, 63*(2), 167-179.

Avery, J. M., & Peffley, M. (2003). Race matters: The impact of news coverage of welfare reform on public opinion. *Race and the politics of welfare reform*, 131-150.

______________________. (2005). Voter registration requirements, voter turnout, and welfare eligibility policy: Class bias matters. *State Politics & Policy Quarterly, 5*(1), 47–67.

Bailey, M. A., & Rom, M. C. (2004). A wider race? Interstate competition across health and welfare programs. *Journal of Politics*, *66*(2), 326-347.

Barrett, E. J. (1997). Gender and race in the state house: The legislative experience. *Social Science Journal, 34*(2), 131-144.

Barrilleaux, C. (1997). A test of the independent influences of electoral competition and party strength in a model of state policy-making. *American Journal of Political Science*, *41*(4), 1462-1466.

Barrilleaux, C., & Bernick, E. (2003). Deservingness, discretion, and the state politics of welfare spending, 1990-96. *State Politics and Policy Quarterly, 3*(1), 1-22.

Barrilleaux, C., Holbrook, T., & Langer, L. (2002). Electoral competition, legislative balance, and American state welfare policy. *American Journal of Political Science, 46*(2), 415-427.

Bentele, K. G., & Nicoli, L. T. (2012). Ending access as we know it: State welfare benefit coverage in the TANF era. *Social Service Review, 86*(2), 223–268.

Berry, W. D., Fording, R. C., & Hanson, R. L. (2003). Reassessing the "race to the bottom" in state welfare policy. *Journal of Politics, 65*(2), 327-349.

Berry, W. D., Ringquist, E. J., Fording, R. C., & Hanson, R. L. (1998). Measuring citizen and government ideology in the American states, 1960-93. *American Journal of Political Science*, *42*(1), 327-348.

Berry, W. D., Richard C. Fording, R. C., Ringquist, E. J., Hanson, R. L., & Klarner, C. (2010). Measuring citizen and government ideology in the American states: A re-appraisal. *State Politics and Policy Quarterly, 10*, 117-135.

Bonoli, G., & Reber, F. (2010). The political economy of childcare in OECD countries: Explaining cross-national variation in spending and coverage rates. *European Journal of Political Research*, *49*(1), 97-118.

Brambor, T., Clark, W. R., & Golder, M. (2006). Understanding interaction models: Improving empirical analyses. *Political analysis, 14*(1), 63-82.

Brecher, C., & Rose, S. (2013). Medicaid's next metamorphosis. *Public Administration Review, 73*(s1), S60-S68.

Bridges, K. M. (2016). The deserving poor, the undeserving poor, and class-based affirmative action. *Emory Law Journal, 66*, 1049-1114.

Briggs, A. (1961). The welfare state in historical perspective. *European Journal of Sociology, 2*(2), 221-258.

Brown, R. D. (1995). Party cleavages and welfare effort in the American states. *American Political Science Review, 89*(1), 23-33.

Bruch, S. K., Meyers, M. K., & Gornick, J. C. (2018). The consequences of decentralization: Inequality in safety net provision in the post–welfare reform era. *Social service review, 92*(1), 3-35.

Burstein, P. (2003). The impact of public opinion on public policy: A review and an agenda. *Political Research Quarterly, 56*(1), 29-40.

_________. (2010). Public opinion, public policy, and democracy. In K. T. Leicht & J. C. Jenkins (Eds.), *Handbook of politics: State and society in global perspective* (pp. 63-79). New York: Springer.

Carrillo, P. E., Early, D. W., & Olsen, E. O. (2014). A panel of interarea price indices for all areas in the United States 1982-2012. *Journal of Housing Economics*, *26*, 81-93.

Cavaillé, C. (2015). Deservingness, self-interest and the welfare state: Why some care more about deservingness than others and why it matters. *LIS Working Paper Series*, No. 652, Luxembourg Income Study (LIS), Luxembourg.

Castles, F. G. (1989). Explaining public education expenditures in OECD nations. *European Journal of Political Research, 17*(4), 431-448.

Center for American Women and Politics (CAWP). (2001). *Women in state legislatures: Past, present and future.* Retrieved June 20, 2017, from http://www.capwip.org/readingroom/cawp-womenstateleg.pdf

Center on Budget and Policy Priorities (CBPP). (2015). *State fact sheets: How states have spent federal and state funds under the TANF block grant.* Retrieved August 25, 2017, from https://www.cbpp.org/sites/default/files/atoms/files/4-8-15tanf_0.pdf

____. (n.d.). *United States: TANF spending factsheet.* http://www.npc.umich.edu/news/events/safetynet/tanf-spending-factsheet.pdf

Clinton, J. D., & Sances, M. W. (2018). The politics of policy: The initial mass political effects of Medicaid expansion in the states. *American Political Science Review, 112*(1), 167-185.

Cnudde, C. F., & McCrone, D. J. (1969). Party competition and welfare policies in the American states. *American Political Science Review, 63*(3), 858-866.

Cohen, S. S. (2001). *Championing child care*. New York: Columbia University Press.

Dawson, R. E., & Robinson, J. A. (1963). Inter-party competition, economic variables, and welfare policies in the American states. *Journal of Politics, 25*(2), 265-289.

Dye, T. R. (1984). Party and policy in the states. *Journal of Politics, 46*(4), 1097-1116.

Erikson, R. S., Wright, G. C., & McIver, J. P. (1993). *Statehouse democracy: Public opinion and policy in the American states.* Cambridge, UK: Cambridge University Press.

Esping-Andersen, G. (1983). After the welfare state. *Public welfare, 41*(1), 28-34.

__________________. (1990). *The three worlds of welfare capitalism*. Oxford: Polity Press.

Ewalt, J. A. G., & Jennings, E. T., Jr. (2014). The Great Recession and social welfare spending in the American States. *International Review of Public Administration*, *19*(3), 308-323.

Falk, G. (2011). *The Temporary Assistance for Needy Families (TANF) block grant: A primer on TANF financing and federal requirements*. Washington, D.C.: Congressional Research Service.

______. (2016). *The Temporary Assistance for Needy Families (TANF) block grant: Responses to frequently asked questions*. Washington, D.C.: Congressional Research Service.

Federal Interagency Forum on Child and Family Statistics. (2017). *America's children: Key national indicators of well-being, 2017.* Retrieved April 2019, from https://www.childstats.gov/pdf/ac2017/ac_17.pdf

Fellowes, M. C., & Rowe, G. (2004). Politics and the new American welfare states. *American Journal of Political Science*, *48*(2), 362-373.

Figlio, D. N., Kolpin, V. W., & Reid, W. E. (1999). Do states play welfare games? *Journal of Urban economics, 46*(3), 437-454.

Filindra, A. (2012). Immigrant social policy in the American states: Race politics and state TANF and Medicaid eligibility rules for legal permanent residents. *State Politics & Policy Quarterly, 13*(1): 26-48.

Flavin, P. (2015). Campaign finance laws, policy outcomes, and political equality in the American states. *Political Research Quarterly, 68*(1), 77-88.

Fossett, J. W. (1987). The consequences of shifting control: Federal and state distribution of small cities CDBG funds in four southern states. *Publius: The Journal of Federalism*, *17*(4), 65-80.

Fry, B. R., & Winters, R. F. (1970). The politics of redistribution. *American Political Science Review*, *64*(2), 508-522.

Gans, H. (1995). *The war against the poor: The underclass and antipoverty policy.* New York: Basic Books.

Garfinkel, I., Rainwater, L., & Smeeding, T. (2010). *Wealth and welfare states: Is America a laggard or leader?* Oxford, UK: Oxford University Press.

Gilens, M. (1999). *Why Americans hate welfare: Race, media, and the politics of antipoverty policy.* IL: University of Chicago Press.

Gilligan, T. W., & Matsusaka, J. G. (1995). Deviations from constituent interests: The role of legislative structure and political parties in the states. *Economic Inquiry*, *33*(3), 383-401.

Goodin, R. E. (1982). Freedom and the welfare state: Theoretical foundations. *Journal of Social Policy, 11*(2), 149-176.

Handler, J. F. (1995). *The poverty of welfare reform*. New Haven: Yale University Press.

Häusermann, S., Picot, G., & Geering, D. (2013). Rethinking party politics and the welfare state–recent advances in the literature. *British Journal of Political Science*, *43*(1), 221-240.

Hawkesworth, M., Casey, K. J., Jenkins, K., & Kleeman, K. E. (2001). *Legislating by and for women: A comparison of the 103rd and 104th Congresses*. Center for American Women and Politics, Rutgers University. Retrieved from http://www.capwip.org/readingroom/women_103_104.pdf

Hega, G. M., & Hokenmaier, K. G. (2002). The welfare state and education: A

comparison of social and educational policy in advanced industrial societies. *German Policy Studies, 2*(1), 143-173.
Heidenheimer, A. J. (1981) Education and social security entitlements in Europe and America. In P. Flora & A. J. Heidenheimer (Eds.), *The development of welfare states in Europe and America* (pp. 269-306). New Brunswick, NJ/ London: Transaction Publishers.
Henderson, T. L., Monroe, P. A., Garand, J. C., & Burts, D. C. (1995). Explaining public opinion toward government spending on child care. *Family relations*, *44*(1), 37-45.
Hero, R. E., & Preuhs, R. R. (2007). Immigration and the evolving American welfare state: Examining policies in the US states. *American Journal of Political Science*, *51*(3), 498-517.
Hill, K. Q. (2003). Democratization and corruption: Systematic evidence from the American states. *American Politics Research, 31*(6), 613-631.
Hill, K. Q., & Leighley, J. E. (1992). The policy consequences of class bias in state electorates. *American Journal of Political Science, 36*(2), 351-365.
Hofferbert, R. I. (1996). The relation between public policy and some structural and environmental variables in the American states. *American Political Science Review, 60*(1), 73-82.
Holbrook, T. M., & Van Dunk, E. (1993). Electoral competition in the American states. *American Political Science Review, 87*(4), 955-962.
Howard, C. (1999). The American welfare state, or states? *Political Research Quarterly, 52*(2), 421-442.
_________. (2007). *The welfare state nobody knows: Debunking myths about U.S. social policy.* New Jersey: Princeton University Press.
Hwang, S. D., & Gray, V. (1991). External limits and internal determinants of state public policy. *Western Political Quarterly, 44*(2), 277-298.
Ingram, H., Schneider, A. L., & deLeon, P. (2007). Social construction and policy design. In P. A. Sabatier (Ed.), *Theories of the policy process* (pp. 93-126). NY: Springer.
Iversen, T., & Stephens, J. D. (2008), Partisan politics, the welfare state, and three worlds of human capital formation. *Comparative Political Studies, 41*(4/5), 600-637.
Jacobsen, K., & McGuire, T. G. (1996). Federal block grants and state spending: The alcohol, drug abuse, and mental health block grant and state agency behavior. *Journal of Health Politics, Policy and Law, 21*(4), 751-768.
Janowitz, M. (1976). *Social control of the welfare state*. NY: Elsevier Scientific Publishing Company.
Jennings, E. T. (1979). Competition, constituencies, and welfare policies in American states. *American Political Science Review, 73*(2), 414-429.
____________. (1983). Racial insurgency, the state, and welfare expansion: A critical comment and reanalysis. *American Journal of Sociology, 88*(6), 1220-1236.
Katz, M. (1989). *The undeserving poor: From the war on poverty to the war on welfare*. New York: Pantheon.
Katz, M. B. (2010a). Public education as welfare. *Dissent, 57*(3), 52-56.
_________. (2010b). The American welfare state and social contract in hard times. *Journal of Policy History, 22*(4), 508-529.

Key, V. O., Jr. (1949). *Southern politics in state and nation*. Knoxville, TN: University of Tennessee Press.

Klarner, C. (2013a). *Other scholars' competitiveness measures*, hdl:1902.1/22519, Harvard Dataverse, VI. Retrieved from https://dataverse.harvard.edu/dataset.xhtml?persistentId=hdl:1902.1/22519

_________. (2013b). *State partisan balance data*, 1937-2011, hdl:1902.1/20403, Harvard Dataverse, VI. Retrieved from https://dataverse.harvard.edu/dataset.xhtml?persistentId=doi:10.7910/DVN/LZHMG3

Kousser, T. (2002). The politics of discretionary Medicaid spending, 1980-1993. *Journal of Health Politics, Policy and Law*, *27*(4), 639-672.

Kronebusch, K. (1993). *Medicaid politics: Policymaking contexts and the politics of group differences in the American states.* Retrieved from ProQuest Dissertations & Theses Global.

____________. (2001). Medicaid for children: federal mandates, welfare reform, and policy backsliding. *Health Affairs, 20*(1), 97-111.

Krueger, B. S., & Mueller, P. D. (2001). Moderating backlash: Racial mobilization, partisan coalitions, and public policy in the American states. *State Politics & Policy Quarterly, 1*(2), 165-179.

Lambright, K. T., & Allard, S. W. (2004). Making tradeoffs in federal block grant programs: Understanding the interplay between SSBG and TANF. *Publius: The Journal of Federalism, 34*(3), 131-154.

Larsen, C. A. (2008). The institutional logic of welfare attitudes: How welfare regimes influence public support. *Comparative Political Studies*, *41*(2), 145-168.

Lerman, A. E., Sadin, M. L., & Trachtman, S. (2017). Policy uptake as political behavior: Evidence from the affordable care act. *American Political Science Review, 111*(4), 755-770.

Lokteff, M., & Piercy, K. W. (2012). "Who cares for the children?" Lessons from a Global Perspective of Child Care Policy. *Journal of Child and Family Studies*, *21*(1), 120-130.

Lukens, G. (2014). State variation in health care spending and the politics of state Medicaid policy. *Journal of Health Politics, Policy and Law*, *39*(6), 1213-1251.

Mandel, R., & Dodson, D. L. (1993). Do women officeholders make a difference? In P. Ries & A. J. Stone (Eds.), *The American woman, 1992-1993* (pp.149-177). New York: Norton.

Matsubayashi, T., & Rocha, R. R. (2012). Racial diversity and public policy in the states. *Political Research Quarterly, 65*(3), 600-614.

Meyers, M. K., Heintze, T., & Wolf, D. A. (2002). Child care subsidies and the employment of welfare recipients. *Demography*, *39*(1), 165-179.

Moffitt, R. A. (2015). The deserving poor, the family, and the U.S. welfare system. *Demography, 52*(3), 729-749.

Moore, J. D., & Smith, D. G. (2005). Legislating Medicaid: Considering Medicaid and its origins. *Health Care Financing Review, 27*(2), 45-52.

Morgan, D. R., & England, R. E. (1984). The small cities block grant program: An assessment of programmatic change under state control. *Public Administration Review, 44*(6), 477-482.

Ng, G. T. (2006). Child care in the United States: Who shapes state policies for children? *Social Work Research*, *30*(2), 71-81.
National Association of State Budget Office (NASBO). (2018). *Summary: NASBO state expenditure report*. Retrieved from https://www.nasbo.org/reports-data/state-expenditure-report
Nikolai, R. (2011). Towards social investment? Patterns of public policy in the OECD world. In N. Morel, B. Palier & J. Palme (Eds.), *Towards a social investment welfare state? Ideas, policies and challenges* (pp. 91-116). Bristol: Policy Press.
OECD. (2016). *Public spending on childcare and early education.* Retrieved January 25, 2018, from the OECD Social Expenditure Database: http://www.oecd.org/els/soc/PF3_1_Public_spending_on_childcare_and_early_education.pdf
Pacheco, J. (2013). The thermostatic model of responsiveness in the American states. *State Politics & Policy Quarterly, 1*3(3), 306-332.
Patterson, J. T. (1994). *America's struggle against poverty, 1900-1994*. Cambridge, MA: Harvard University Press.
Pavetti, L, & Schott, L. (2011). *TANF's inadequate response to recession highlights weakness of block-grant structure: Proponents wrong to see it as model for Medicaid, SNAP, or other low-income programs*. Washington, D.C.: Center on Budget and Policy Priorities. Retrieved from https://www.cbpp.org/sites/default/files/atoms/files/7-14-11tanf.pdf
Personal Responsibility and Work Opportunity Reconciliation Act of 1996, Pub. L. 104-193, 110 Stat. 2105. (1996).
Petersen, M. B. (2012). Social welfare as small-scale help: Evolutionary psychology and the deservingness heuristic. *American Journal of Political Science, 56*(1), 1-16.
Petersen, M. B., Sznycer, D., Cosmides, L., & Tooby, J. (2012). Who deserves help? Evolutionary psychology, social emotions, and public opinion about welfare. *Political Psychology, 33*(3), 395-418.
Peterson, P. E., & Rom, M. (1989). American federalism, welfare policy, and residential choices. *American Political Science Review, 83*(3), 711-728.
Pew Research Center. (2012). *2010, Hispanics in the United States statistical portrait.* Retrieved April 2019, from https://www.pewhispanic.org/2012/02/21/2010-statistical-information-on-hispanics-in-united-states/
Pierson, K., Hand, M. L., & Thompson, F. (2015). The government finance database: A common resource for quantitative research in public financial analysis. *PloS ONE, 10*(6), e0130119. https://doi.org/10.1371/journal.pone.0130119
Plotnick, R. D., & Winters, R. F. (1985). A politico-economic theory of income redistribution. *American Political Science Review, 79*(2), 458-473.
Poggione, S. (2004). Exploring gender differences in state legislators' policy preferences. *Political Research Quarterly, 57*(2), 305-314.
Powell, G. B. (2004). The chain of responsiveness. *Journal of Democracy*, *15*(4), 91-105.
Preuhs, R. R. (2006). The conditional effects of minority descriptive representation: Black legislators and policy influence in the American states. *Journal of Politics*, *68*(3), 585-599.
Preuhs, R. R. (2007). Descriptive representation as a mechanism to mitigate policy

backlash: Latino incorporation and welfare policy in the American states. *Political Research Quarterly, 60*(2), 277-292.
Radcliff, B., & Saiz, M. (1995). Race, turnout, and public policy in the American states. *Political Research Quarterly, 48*(4), 775-794.
Ranney, A. (1976). Parties in state politics. In H. Jacobs & K. N. Vines (Eds.), *Politics in the American states: A comparative analysis* (3rd ed., pp. 51-92). Boston: Little, Brown.
Reingold, B., & Smith, A. R. (2012). Welfare policymaking and intersections of race, ethnicity, and gender in U.S. state legislatures. *American Journal of Political Science*, *56*(1), 131-147.
Ringquist, E. J., Hill, K. Q., Leighley, J. E., & Hinton-Andersson, A. (1997). Lower-class mobilization and policy linkage in the U.S. states: A correction. *American Journal of Political Science, 41*(1), 339-344.
Rodgers, H. R., & Tedin, K. L. (2006). State TANF spending: Predictors of state tax effort to support welfare reform. *Review of Policy Research*, *23*(3), 745-759.
Rom, M.C. (1999). Transforming state health and welfare programs. In V. Gray & H. Jacobs (Eds.), *Politics in the American states* (pp.117-131). Washington, DC: CQ Press.
Schneider, A., & Ingram, H. (1993). Social construction of target populations: Implications for politics and policy. *American Political Science Review*, *87*(2), 334-347.
Schott, L., Floyd, I., & Burnside, A. (2019). *How states use funds under the TANF block grant.* Washington, D.C.: Center on Budget and Policy Priorities. Retrieved from https://www.cbpp.org/sites/default/files/atoms/files/1-5-17tanf.pdf
Schott, L., Pavetti, L., & Floyd, I. (2015). *How states use federal and state funds under the TANF block grant*. Washington, D.C.: Center on Budget and Policy Priorities. Retrieved from https://www.cbpp.org/sites/default/files/atoms/files/4-8-15tanf_0.pdf
Schottland, C. (1967). Introduction. In C. I. Schottland (Ed.), *The welfare state: The selected essays.* New York: Harper & Row.
Sharkansky, I., & Hofferbert, R. I. (1969). Dimensions of state politics, economics, and public policy. *American Political Science Review, 63*(3), 867-879.
Shufeldt, G., & Flavin, P. (2012). Two distinct concepts: Party competition in government and electoral competition in the American states. *State Politics & Policy Quarterly, 12*(3), 330-342.
Skocpol, T., Abend-Wein, M., Howard, C., & Lehmann, S. G. (1993). Women's associations and the enactment of mothers' pensions in the United States. *American Political Science Review, 87*(3), 686-701.
Smith, M. A. (1997). The nature of party governance: Connecting conceptualization and measurement. *American Journal of Political Science*, *41*(3), 1042-1056.
Social Security Administration (SSA). (2001). *Annual report of the Supplemental Security Income program.* MD: Baltimore. Retrieved from https://www.ssa.gov/oact/ssir/index.html
Soss, J. (1999). Lessons of welfare: Policy design, political learning, and political action. *American Political Science Review, 93*(2), 363-380.

Soss, J., Schram, S. F., Vartanian, T. P., & O'Brien E. (2001). Setting the terms of relief: Explaining state policy choices in the devolution revolution. *American Journal of Political Science, 45*(2), 378-395.

Thomann, E., & Rapp, C. (2018). Who deserves solidarity? Unequal treatment of immigrants in Swiss welfare policy delivery. *Policy Studies Journal, 46*(3), 531-552.

Thomas, S., & Welch. S. (1991). The impact of gender on the activities and priorities of state legislators: Legislative styles and policy priorities. *Western Political Quarterly, 44* (2), 445-456.

Thompson, F. J. (2012). *Medicaid politics: Federalism, policy durability, and health reform.* Washington, D.C.: Georgetown University Press.

Titmuss, R. (1958). *Essays on "the welfare state"*. Crows Nest, Australia: Allen & Unwin.

U.S. Bureau of Labor Statistics. (2000-2010). *Nonfatal occupational injuries and illnesses requiring days away from work*. U.S. Department of Labor. Available from https://www.bls.gov

U.S. Census Bureau. (1998, 1999). *State & local government finance historical datasets and tables.* Retrieved March 1, 2019, from https://www.census.gov/data/datasets/1998/econ/local/public-use-datasets.html.

U.S. Census Bureau. (2006) *Government finance and employment: Classification manual.* Retrieved March 22, 2016, from https://www2.census.gov/govs/pubs/classification/2006_classification_manual.pdf

U.S. Department of Health and Human Services (U.S. HHS). (2019). *State TANF spending data*, various years. Retrieved February 4, 2019, from https://www.acf.hhs.gov/ofa/programs/tanf/data-reports

Van Oorschot, W. (2006). Making the difference in social Europe: Deservingness perceptions among citizens of European welfare states. *Journal of European Social Policy, 16*(1), 23-42.

_______________. (2000). Who should get what, and why? On deservingness criteria and the conditionality of solidarity among the public. *Policy & Politics, 28*(1), 33-48.

Van Oorschot, W., & Roosma, F. (2015). The social legitimacy of differently targeted benefits, *ImPRovE Working Paper* (No. 15/11). Antwerp: Herman Deleeck Centre for Social Policy, University of Antwerp. Retrieved from https://core.ac.uk/download/pdf/34633028.pdf

Waldfogel, J. (2001). International policies toward parental leave and child care. *The Future of Children*, *11*(1), 99-111.

Wedderburn, D. (1965). Facts and theories of the welfare state. *Socialist Register, 2*(2), 127-146.

Welch, S. (1985). Are women more liberal than men in the U.S. Congress? *Legislative Studies Quarterly, 10*(1), 125-134.

White, L. A. (2009). Explaining differences in child care policy development in France and the USA: Norms, frames, programmatic ideas. *International Political Science Review*, *30*(4), 385-405.

Wilensky, H. (1975). *The welfare state and equality*. Berkeley: University of California Press.

Winters, R. (1976). Party control and policy change. *American Journal of Political*

Science, 20(4), 597-636.
Wright, G. C. (1977). Racism and welfare policy in America. *Social Science Quarterly, 57*(4), 718-730.
Zellner, A. (1962). An efficient method of estimating seemingly unrelated regressions and tests for aggregation bias. *Journal of the American Statistical Association, 57*(298), 348-368.

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Maxwell School of Citizenship and Public Affairs, Syracuse University, Syracuse, NY

M.A., Public Administration, 2006
Graduate School of Governance, SungKyunKwan University, Seoul, Korea
Thesis Title: *A Study on the WHO and the UN Millennium Development Goals: From the Global Governance Approach*

B.A., British & American Literature (Public Administration Minor), 2004
College of English, Hankuk University of Foreign Studies, Seoul, Korea

RESEARCH EXPERIENCE

Publications

[3] Kwon, H. & Kwak, H. (2006). The Reform of the Civil Service Pension Scheme and Policy Issues. *Korean Policy Studies Review*, 15(4), 189-213.

[2] Kwon, H. & Kwak, H. (2007). What are the Policy Issues in the Korean Civil Service Pension Reform, *Passion Governance 21*, No. 3, p. 1. Seoul: BK 21 Project Group.

[1] Kwon, H., Park, Y. & Kwak, H. (2005). *The Civil Service Pension Reform in Korea*. Seoul: Institute of Governance Assessment.

Conference Presentations

[7] Kwak, H. Making sense of different welfare measures: How and why do they matter? April 2018, presented at the Midwest Political Science Association Annual Conference, Chicago, IL.

[6] Kwak, H. Rethinking the concept of welfare in the American welfare states: A literature Review on welfare policy determinant studies. April 2018, presented at the Midwest Political Science Association Annual Conference, Chicago, IL.

[5] Kwak, H. & Jennings, E. T. Does state policy orientation matter?: State child care spending under the Temporary Assistance to Needy Families Programs. April 2017, presented at the Midwest Political Science Association Annual Conference, Chicago, IL.

[4] Yu, J. & Kwak, H. Program type and budget allocation: Does it make a difference? November 2015, presented at the Association for Public Policy Analysis and Management Conference, Miami, FL.

[3] Kwak, H. & Jennings, E. T. A study on the adoption of smoke-free campus policy in the United States, September 2014, presented at the Southeastern Conference for Public Administration, Atlanta, GA.

[2] Kwon, H. & Kwak, H. Global Governance and the possibility of global social policy: Why is it difficult to achieve MDGs? October 2008, presented at the Korean Association of Public Administration International Conference 2008, Seoul, Korea.

[1] Kwon, H. & Kwak, H. Global Governance and the Role of Nation State. November 2007, presented at Toward Establishing Sustainable Planning and Governance Conference (II), SungKyunKwan University, Seoul, Korea.

Other Research Experience

Martin School of Public Policy and Administration, University of Kentucky

[2] **Research Assistant** to Dr. Edward Jennings, Augus 2014 – August 2017

[1] **Research Assistant** to Dr. David Wildasin, August 2013 – May 2014

Maxwell School of Citizenship and Public Affairs, Syracuse University

[1] **Research Associate** to Dr. Hans Schmitz, August 2010 – May 2013

Graduate School of Governance, SungKyunKwan University, Korea

[1] **Research Assistant** to Dr. Huck-ju Kwon, Novermber 2005– December 2007 & November 2008 – April 2009

Labor Insurance Research Institute at Korea Workers' Compensation & Welfare Services, Korea

[1] **Research Assistant** to Dr. Jang-gi Kim, September 2008 – December 2008

TEACHING AND ACADEMIC EXPERIENCE

[12] **Policy Coach**, May 2019
Henry Clay College Student Congress

[11] **Guest Lecturer**, March 2019
Course: Public Policy Analysis Overview (PA 690)

[10] **Guest Reviewer**, February 2019
Course: Capstone (PA 681)

[9] **Discussant**, April 2017

Poster session at the Midwest Political Science Association Conference

[8] **Teaching Assistant**, August 2011 – December 2011
Course: Human Rights & Global Affairs **(**Undergraduate level; face-to-face Format)
Maxwell School of Citizenship and Public Affairs, Syracuse University

[7] **Teaching Assistant**, February 2010 – June 2010
Course: Government and NGOs (Graduate level; On-line Format)
Department of Public Administration, Korea National Open University (KNOU), Korea

[6] **Teaching Assistant**, January 2009 – February 2010
Course: Korean Government (Undergraduate level; On-line Format)
Department of Public Administration, Korea National Open University (KNOU), Korea

[5] **Teaching Assistant**, January 2009 – February 2010
Course: Development Administration (Undergraduate level; On-line Format)
Department of Public Administration, Korea National Open University (KNOU), Korea

[4] **Intern**, February 2008 – August 2008, Geneva, Switzerland
UN Internship Program at the United Nations Research Institute for Social Development (UNRISD) (*funded by the Global Internship Program, the Korea Research Foundation, Korea*)

[3] **Visiting Study Fellow**, January 2007 – March 2007, Oxford, UK
Visiting Research/Study Fellowship Program at the Department of International Development Queen Elizabeth House, the University of Oxford (*funded by the BK21 Governance Program, SungKyunKwan University, Korea*)

[2] **Intern**, February 2008 – August 2008, Pathumthani, Thailand
Asian Governance and Leadership Training and Observation Tour Program in the Asian Disaster Preparedness Centre (ADPC) at the Asian Institute of Technology (AIT) (*funded by the Ministry of Educational Science and Technology, Korea*)

[1] **Teaching Associate**, September 2004 – August 2005
Graduate School of Governance, SungKyunKwan University, Korea

OTHER EXPERIENCE

[2] **Co-Editor**, March 2007 – December 2007
Brief titled *'Passion Governance 21'*, Graduate School of Governance, SungKyunKwan University, Korea

[1] **Project Coordinator**, November 2006 – December 2006
Developmental Strategies of Northeast Asian Countries in the Globalized World: Intensive Lecture Series at the Graduate School of Governance, SungKyunKwan University, Korea (*PI: Dr. Huck-ju Kwon, funded by the BK21 Governance Program*)

SCHOLARSHIPS AND FELLOWSHIPS

Scholarships

[10] Full Scholarship and Stipend, Martin School of Public Policy and Administration, University of Kentucky, 2013 – 2017

[9] Conference Grant, Martin School of Public Policy and Administration, University of Kentucky, 2014 – 2018

[8] Graduate School Travel Grant, Graduate School, University of Kentucky, 2014 – 2016

[7] Summer Assistantship, Martin School of Public Policy and Administration, University of Kentucky, 2014, 2016, & 2017

[6] Full Scholarship and Stipend, Maxwell School of Citizenship and Public Affairs, Syracuse University, 2010 – 2012

[5] Governmental Scholarship for the Global Internship Program, Korea Research Foundation, Korea, 2007

[4] BK 21 Scholarship, Graduate School of Governance, SungKyunKwan University, Korea, 2006 – 2007

[3] External Scholarships, SungKyunKwan University, Korea, 2004 – 2007

[2] Second Distinction Scholarship, Hankuk University of Foreign Studies, Korea, 2003 & 2004

[1] Department Chief Scholarship, Hankuk University of Foreign Studies, Korea, 2000

Fellowships

[2] Summer Fellowship, Maxwell School of Citizenship and Public Affair, Syracuse University, 2011

[1] Visiting Research/Study Fellowship, Brain Korea 21 Program, Graduate School of Governance, SungKyunKwan University, Korea, 2007