PETROLEUM POLITICS, THE MANAGEMENT AND CURSE OF RESOURCES IN CENTRAL ASIA

Kazakhstan and Turkmenistan in Comparative Perspective

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Abstract

Why does the resource curse affect some mineral-rich states but not all? While its likelihood to paradoxically produce an array of negative outcomes such as unbalanced economic growth, authoritarianism and impoverished populations in developing states is well-documented, it remains unclear why it only appears to befall some, but not all states. Two otherwise similar mineral-rich, newly independent Central Asian states Turkmenistan and Kazakhstan present an opportunity to study this puzzle as they have developed in diverging trajectories along the resource curse path after the disintegration of the Soviet Union. While Turkmenistan is notorious for its classical rentier state with the worst development/poverty indicators in the region, Kazakhstan improved its business environment, fiscal sector and Human Development Index indicators. In answering this puzzle the paper develops the rentier state model that lies at the heart of the resource curse mechanisms and outcomes, followed by an integrative case study based on this model. The main findings suggest that the difficulty of extraction factor characteristic of Kazakh oil fields has led the government to abandon its command economy (in contrast to Turkmenistan) and rely heavily on foreign investment and technology. Large-scale foreign privatization of the petroleum sector has led to a series of legislative, fiscal and expenditure reforms that continue to hinder the formation of a classical rentier state. The thesis also concludes that private ownership structure – and its observed positive impact – might help institutionalize reforms and better manage resource wealth in other mineral-rich developing states.

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Introduction

Resource curse refers to the paradox when mineral abundance, in particular petroleum, tends to produce poor performance along various economic, political and developmental indicators and was first used in print by Richard Auty in 1993 (Auty 1993; Ross 2014).[1] The negative outcomes usually include, but are not limited to, authoritarian regimes, weak states, unbalanced growth, poor economic performance and impoverished populations (Sachs and Warner 2001; Friedman 2006; Jones Luong and Wienthal 2010).

Both scholars and policymakers have used the term extensively over the last decade in an attempt to explain and potentially manage its adverse effects, especially with regards to the regions of the former Soviet Union, Latin America, the Middle East and Africa. Hundreds of scholarly articles addressed the maladies of the natural resources in mineral-rich states between 2001 and 2013, with both the European Union and the United States having set in place transparency laws specifically designed to stop the adverse effects in mineral exporting states. Notwithstanding the efforts on the part of the United Nations Development Program, the World Bank and the G20 that launched initiatives to alleviate and manage the curse, it still remains unclear what its exact dimensions and solutions are (Ross 2014).

The resource curse was found to mostly pertain to developing states that lacked strong institutions in the first place (Gelman and Marganiya 2010). Hence, when the Soviet Union abruptly disintegrated in 1991 and produced five newly independent petroleum-rich states with weak institutions – Russia, Azerbaijan, Kazakhstan, Turkmenistan and Uzbekistan – observers

[1] Following Michael L. Ross's (2014, 240) definition, "petroleum" in this thesis refers to both oil and natural gas, and "mineral (or oil) abundance" and "resource (or oil) wealth" to the value of a state's natural resource (or petroleum) production per capita.

were quick to doom them to similar fates (Karl 1999, 46; 2000; Sabonis-Helf 2004, 159-60; Amuzegar 2001).

The puzzling fact is that these countries, nevertheless, have produced diverging outcomes over the past quarter of a century. Of particular interest for a case study comparison are the two most similar cases Turkmenistan and Kazakhstan – despite scoring the same across all of the relevant developmental factors, they produced diverging results along the resource curse indicators. More specifically, while Turkmenistan is notorious for its classical rentier state model with indebtedness, bloated public sector and the worst development/poverty indicators in the region, Kazakhstan made efforts at shrinking the public sector, institutionalizing control over government spending, improved its business environment, fiscal sector and Human Development Index indicators (Crude Accountability 2009).

As to the similarities, on top of being mineral-rich and resource-dependent, both Turkmenistan and Kazakhstan are classified as authoritarian states that inherited a legacy of command economies and weak institutions; they share a colonial past, the same neighborhood (Central Asia), a majority Muslim population, and the same number of years of independence. All of these factors have been previously associated with developmental and political instability outcomes in earlier research (Political Instability Task Force 2005; Marshall and Cole 2014). Another factor one is able to hold constant in this comparison is the international context because both states emerged as newly independent resource-rich countries at the same time.

With the aim of explaining why otherwise similar, mineral-rich cases have fared differently along the resource curse outcomes, I will first separate the outcomes into three broad categories – political, economic and developmental/societal (as shown in Figure 1) in Chapter 1. This separation allows for better analytical clarity and facilitates the cross-case comparison that follows later because my overview of the existing literature shows that previous research

fails to systematically separate various variables of the resource curse and meshes together economic/political and societal factors and outcomes.

Next, in Chapter 2 I will detail the mechanisms of the resource curse through discussing the central concept behind them – the *rentier state*. Rentier state is the central explanatory variable of how states become resource-dependent and follow the resource curse path to produce negative outcomes. Based on this literature, the chapter builds the concept and formulates its constitutive components as well as their indicators to facilitate the comparison of cases.

Chapter 3 on Methodology explains how these indicators are used to first do the Cross-case Comparison (Chapter 4) of the two states and establish the points of divergence from the resource curse path in the case of Kazakhstan. Following, the Within-Case Study of Kazakhstan (Chapter 5) suggests potential explanations for this variance. The main findings suggest that the difficulty of extraction factor characteristic of Kazakh oil fields has led the government to abandon its command economy (in contrast to Turkmenistan) and rely heavily on foreign investment and technology. The large-scale foreign privatization of the petroleum sector led to a series of legislative, fiscal and expenditure reforms that have had indirect positive impact and continue to hinder the formation of the classical rentier state. Implications of the findings for broader resource management are discussed in Chapter 6.

1.
Resource Curse

While the negative outcomes associated with states that discover and exploit natural resource endowments, particularly minerals like gas and oil, have been extensively documented, it remained contested whether a certain type of state was prone to the so called resource curse. This chapter first outlines the scholarship on the resource curse literature followed by the findings that suggest developing states with weak institutions are more susceptible to the resource curse than those with established strong institutions. Further, in order to facilitate analytical clarity and further comparison of cases, I suggest here separating the negative outcomes – and corresponding causal mechanisms – of the resource curse into three broad categories: political, economic and developmental/societal.

1.1 Overview of Literature on the Resource Curse

Before the late 1980s, the discovery of abundant mineral resources was broadly considered to be a potential for a boon, especially for developing countries (Rosser 2006). In the aftermath of the worldwide resource boom of the 1970s, however – when many states acquired substantial rents from the extraction of resources but still displayed low rates of economic growth – to the fore came the resource curse thesis (Goodman and Worth 2008).

Coined by Richard Auty (1993) the term resource curse referred to how indicators of underdevelopment, as opposed to a fortune boost prevailed among natural resource-endowed states. This is what Terry Karl (1997, 40) famously described as "the paradox of plenty." The conclusion that "mineral-rich countries perform less well" in comparison to those that are resource poor has been broadly demonstrated in historical practices of wealth distribution and economic growth (Bridge 2004: 228 in reference to Auty and Warhurst 1993; Davis and Tilton

2005); the bulk of evidence demonstrably supports the curse hypothesis (Rosser 2006; Goodman and Worth 2008).

As Wienthal and Jones Luong (2004) explain, the hypothesis that mineral wealth impedes performance suggests that the extractive sector absorbs human and financial resources resulting in what remains being insufficient to grow or even maintain competitiveness of the other non-extractive sectors. On top of it, state mining revenues may conceal weaknesses in the economic sector as well as hide the need for reform. As a consequence, this facilitates the upsurge of predatory or factional states that are unwilling to and incapable of developing coherent social welfare agendas and economic policies (Bridge 2004). Additionally, mineral booms can lead to higher exchange rates and inflation, which in turn undermine the viability of non-mineral export sectors, also known as 'Dutch Disease' (Goodman and Worth 2008; Bridge 2004).

Recent econometric literature has also extensively documented the negative relationship between economic performance and mineral wealth (Sachs and Warner 1995, 2001), oil in particular (Kaldor, Karl and Said 2007; Sala-i-Martin and Subramanian 2003; Smith 2004). Most scholars appear to agree that mineral abundance is largely associated with an array of poor indicators such as authoritarian regimes, weak states, unbalanced growth, poor economic performance and impoverished populations (Sachs and Warner 2001; Friedman 2006; Jones Luong and Wienthal 2010).

1.1 The Role of Existing Institutions in Managing Mineral Wealth

In discussing the resource curse, Karl (1997, 74) noted that "petro-states are built on what already exists." Confirming this observation, more recent research has shown that the negative outcomes of the resource curse were found to pertain mainly to developing countries with weak institutions (Mehlum, Moene and Torvik 2006). This explained the puzzle of why abundance

of oil and gas led to long-term prosperity and stability in Norway, while oil-rich Nigeria is riven with corruption, incessant conflicts and inefficiency. Hence, institutions were found to mediate the effects of the potential resource curse whereby strong institutions provide barriers to the resource curse symptoms, while weak institutions aggravate them (Gelman and Marganiya 2010).

Specifically, the contours of the debate have shifted as described by Bridge (2004) below. Despite the seeming consensus among earlier authors, Bridge (2004, 229) found in his critical analysis of an extensive body of work published in the 1990s and early 2000s that encompassed a number of developed and developing countries, that the debate is ongoing as to whether mineral booms present a curse or a cure (Davis and Tilton 2005).

In his 2003 project while researching the experience of Norway's oil industry and its rapid growth, Larsen tested the hypothesis that it is mainly poor countries that are susceptible to the resource curse. Larsen added a temporal dimension to his study and emphasized the highly specific particularities of the local factors in preventing the resource curse. His findings suggest that the specificities of Norwegian economic and political institutions that included "strong social norms of equality and solidarity" leading to "modest" and "patient" development that might have been quite unique to the Norwegian community played the fundamental role in escaping the resource curse (Larsen 2003, 18). Additionally, the decision on the government's part to reinvest oil profits in further development of technology and know-how are also referred to as possible factors that averted the resource curse (18). Larsen (2003, 19) concludes that, in the cases of the occurrence of the resource curse "the success may have fed its own demise" that led to an emergent illusionary sense of inexhaustible wealth and associated pressures to allocate oil money on mounting numbers of social remedies.

Consequently, there is a growing scholarly interest aiming to understand why and how some resource-rich states might be avoiding the resource curse. This inevitably requires greater

attention to the "role of social forces in shaping economic policies and hence economic outcomes in resource abundant countries" (Rosser 2006, 566). As the above overview suggests, the resource curse is increasingly perceived not so much as an unescapable consequence of endowment of mineral resources, but rather it is increasingly seen as a result of a range of potentially controllable external and internal factors that are specific to particular times, arrangements, minerals and countries with institutions playing a major role in the formation of outcomes (Rosser 2006).

1.2 Economic, Political, and Developmental Outcomes

Regarding the specification of the negative outcomes and the corresponding mechanisms through which the resource curse operates, the literature tends to mesh together an array of economic variables – price volatility, crowding out of manufacturing and Dutch disease, political – autocratic regimes and oligarchic institutions, and societal – rentier mentality (Frankel 2012). To facilitate the ease of the cross-comparison, I suggest separating these negative outcomes – and hence, corresponding mechanisms – into three broad categories: economic, political and developmental (societal) outcomes. Thus, the theoretical premise of this paper builds on the assumption that natural resource wealth in states with weak institutions leads to three broad categories of negative outcomes, as shown in Figure 1: economic – unbalanced growth, political – authoritarianism, and developmental – low standards of living.

Economically speaking, Sachs and Warner (1995) found that controlling for other structural attributes, a state's economic dependence on minerals and oil has a correlation with slow and unbalanced economic growth. Their extension and summary of the previous research (Sachs and Warner 2001) shows evidence that countries with an abundance of natural resource wealth have a tendency to grow at slower rates their resource-poor counterparts. Sachs and Warner (2001) conclude that their results are not easily expounded by other variables, or by

alternative methods of measuring resource wealth. Their paper asserts that there is little direct indication that omitted climatic or geographical variables explain the resource curse. Similarly, it is unlikely that there might be a bias in their estimations that might result from some other unobserved deterrent of growth (Frankel 2012). Other research projects that discover a negative impact of specifically oil on economic performance, include Sala-i-Martin and Subramanian (2003); Smith (2004); and Kaldor, Karl and Said (2007).

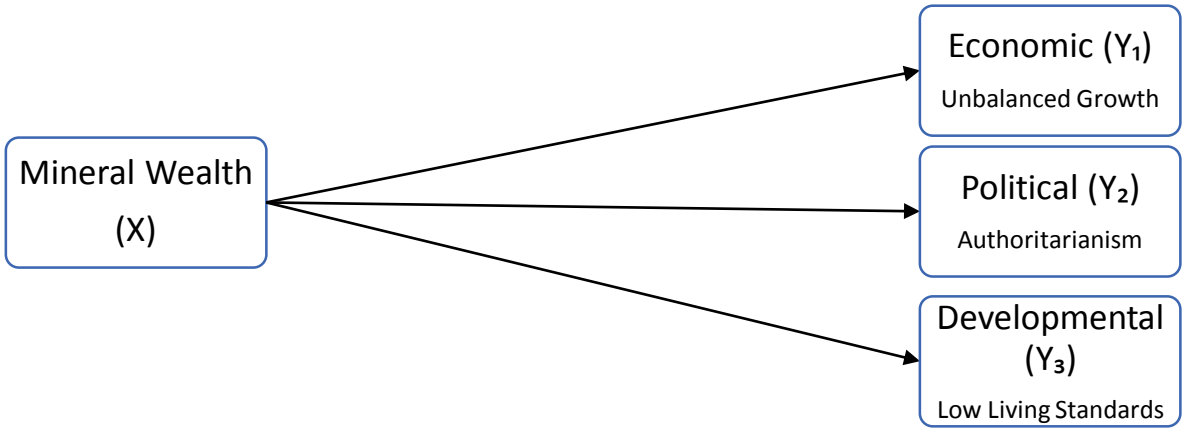

FIGURE 1: RESOURCE CURSE OUTCOMES

In political terms, the relationship between autocratic rule and petroleum wealth has long been outlined by the scholars studying the Middle East and resource-rich countries in general (Mahdavy 1970; Beblawi 1987; Chaudhry 1989; Crystal 1990; Bellin 1994; Yates 1996; Gause 2004). In addition, Barro (1999) and Ross (2001a) provide examples of earlier quantitative cross-national studies.

The many replications of the central finding that higher rates of oil wealth is associated with lower rates of democracy include the numerous more recent works that use increasingly sophisticated methods and better data such as Aslaksen (2010) and Tsui (2011). Andersen and Ross (2014) similarly report that these results are robust to the use of country fixed effects as well as instrumental variables (Ramsay 2011; Tsui 2011). Employing an extreme bounds

analysis Gassebner et al. (2012) identify dependence on oil as one of the few correlates of regime types that consistently show robust patterns. Integrating the results of 29 studies and 246 empirical estimates Ahmadov (2013) uses a statistical meta-analysis of the oil–democracy relationship to conclude that oil has a robust, nontrivial and negative impact on democracy. Prichard et al. (2014) also show that the revenues that governments receive from the natural resource exploitation have statistically significant and large impact on the persistence of autocratic rule by employing a set of wide-ranging econometric tests as well as an improved and more recent dataset on cross-national resource.

And finally, pertaining to development and social impact, mineral-exporting states also tend to score a lot worse when it comes to poverty among the population and standards of living. Ross (2001b) reports that citizens of mineral-exporting states are more likely to be subjected to high levels of child mortality, poverty and income inequality while the government tends to engage in public spending which is, nevertheless, increasingly unproductive in most cases. This is because the boom of export revenues exerts the pressure on governments to share with the public the increased revenues. Often motivated by politics, however, rather than genuine developmental goals or profit, the governments increasingly invest in public work projects that have little consequence in terms of productivity. These are often referred to as "white elephant projects" and include numerous instances of public gestures of subsidizing fuel, food, government jobs and failing industries (Auty 1990; Gelb and Associates 1988; McMahon 1997).

One of the many prominent examples of the white elephant projects is the Nigerian Ajaokuta steel mill that was built in the government's attempt to appease the region and create jobs for the Yoruba population in the 1970s. The project cost the government "over US$3 billion," (Ascher 1999, 179) but has still not produced a commercial ton of steel" (Sala-I-Martin and Subramanian 2003, 13).

Similarly, Wienthal and Jones Luong (2006) observe that instead of investing the export windfalls into development and institutionalization of responsive structures and mechanisms, the government spends large sums of money on maintaining networks of patronage rule as well as providing vast subsidies to the residents to garner political and social support (Anderson 1987, Chaudhry 1989, Karl 1997). As an example, in 1975 the government of Kuwait employed 75 percent of the total workforce, but most were "underqualified and underutilized" (Crystal 1989, 434). In brief, these countries are increasingly characterized by the "progressive substitution of public spending for statecraft" (Karl 1997, 16).

Next, in line with this separation of outcomes, Chapter 2 proceeds to detail each of the three causal mechanisms through which these economic, political and developmental outcomes are reached. These mechanisms are based on the central concept of the paper – the *rentier state*.

2.
Mechanisms – Rentier State

Following an overview of literature on rentier state theory, this chapter develops the *rentier state* model slightly modifying rentier theory scholars' earlier operationalization. It then shows how its constitutive components – *rentier government*, *rentier economy* and *rentier society* – act as the causal mechanisms leading to the negative outcomes outlined earlier: unbalanced economic growth, authoritarianism and low standards of living. The complete structural representation of the outcomes of the resource and the associated mechanisms of the rentier state model are shown in Figure 2. This structure of outcomes and mechanisms (as operationalized in this chapter) is later used to guide the subsequent Cross-Case Comparison of Turkmenistan and Kazakhstan in Chapter 4.

2.1 Overview of Literature on Rentier State Theory

Wienthal and Jones Luong (2006, 38) argue that mineral-rich states, in particular those rich in petroleum, inevitably become rentier states. Rentier states rely on external sources of rents and consequently seek to exert social and political control over their populations by means of these revenues. By virtue of their authority in allocation and redistribution of the income acquired from natural resource rents, they engage in creation and maintenance of economic dependencies (Beblawi and Luciani 1987; Delacroix 1980). This has numerous critical implications for state-societal relations and outcomes along economic, political and developmental dimensions.

First, the government's freedom in its full reliance on external as opposed to internal sources for revenue reduces popular demands for representation as well as the need for state leaders to be accountable to the public (Wienthal and Jones Luong 2006). As a result, this impairs the development of opposition on the part of the society and weakens the state (Beblawi

and Luciani 1987). In fact, the lack of an institutionalized and viable tax regime has been regularly associated with impeding democratization and state capacity as well as undermining broad economic growth (Shafer 1994; Karl 1997).

Second, extensive research shows that rentier states are often subject to high levels of corruption and state capture (Ross 2001c). With the bulk of the population being practically disenfranchised, the relative few that are in charge of the natural resource sector are in a position to disproportionately exert influence over governmental policies. Primarily two reasons account for this development. First, with the mineral sector being highly concentrated in nature, this allows a very small number of individuals and firms to occupy the industry and present a united front in their effort to pressure the state. Second, the sole economic effect of the petroleum sector nurtures the propensity of the state to conflate its own interests with those of the sector's (Shafer 1994). The most prominent and extreme illustration of where interests and faces of the ruling families and the oil sector are inseparable and indistinguishable are the Gulf States. As a consequence, both parties' vested interests lie in nontransparent transactions that foster the state autonomy with regards to the general population and further enable those with access to extractive rents to enrich themselves (in most cases primarily government officials) at the expense of the society (Teichman 1988; Shafer 1994; Karl 1997; Ross 2001c; Wienthal and Jones Luong 2006).

Hence, the tendency of the mineral-rich states to develop into rentier states has broad implications including, but not limited to skewed state-societal relations, weakly institutionalized states and authoritarian regimes, corrupt regimes (Wienthal and Jones Luong 2006). One of the typical features of rentier states include officeholders that are able to almost indefinitely maintain their ruling positions by virtue of the disproportionate advantages they hold over the potential opponents allowed for by the unrestrained access to vast rents (Wantchekon 1999). Another way in which the regimes within rentier states are able to

maintain themselves in power is by complementing the deterrence of opponents by obviating popular discontent and mobilization. Social discontent is usually successfully preempted with either populist "white elephant" policies or because the incumbents are in control of effective internal security forces (Bellin 2004; Smith 2004). As a consequence, there are only very few examples of developing states that were able to direct their petroleum wealth into the creation of political and socioeconomic conditions conducive to stable growth and transitions to democracy; some cited examples are Venezuela and the Republic of Congo (Karl 1987; Clark 1997; Wienthal and Jones Luong 2006).

Finally, the negative impact of the reliance on external resource rents is also confounded by the unstable cycles of boom and bust. Booms aggravate both rent-seeking behavior and state spending. This further buttresses the dynamic of authoritarian, corrupt regimes and weakly institutionalized states (Karl 1997, 139). The boom cycles also create strong disincentives for the state leaders to foster the formation of strong institutions because those are likely to restrict the elites' capacity to allocate rents to those who support the status quo. This further enfeebles the state (Ascher 1999; Ross 2001a). In turn, states that are weakly institutionalized are rarely able to effectively respond to the periods of bust because of some combination of the following factors – sectoral and factional interests have seized the process of policy-making and/or the bureaucracies have become too bloated and/or centralized to adjust to the cycles of boom and bust (Chaudhry 1989; Shafer 1994; Karl 1997; Wienthal and Jones Luong 2006).

2.2 Operationalization: Three Components of the Rentier State

As shown in Figure 2, at the heart of the mechanisms through which the causal effects of the resource curse occur lies the *rentier state*. Hence, in the context of developing states with weak institutions resource wealth leads to the formation of the rentier state that produces the outlined outcomes.

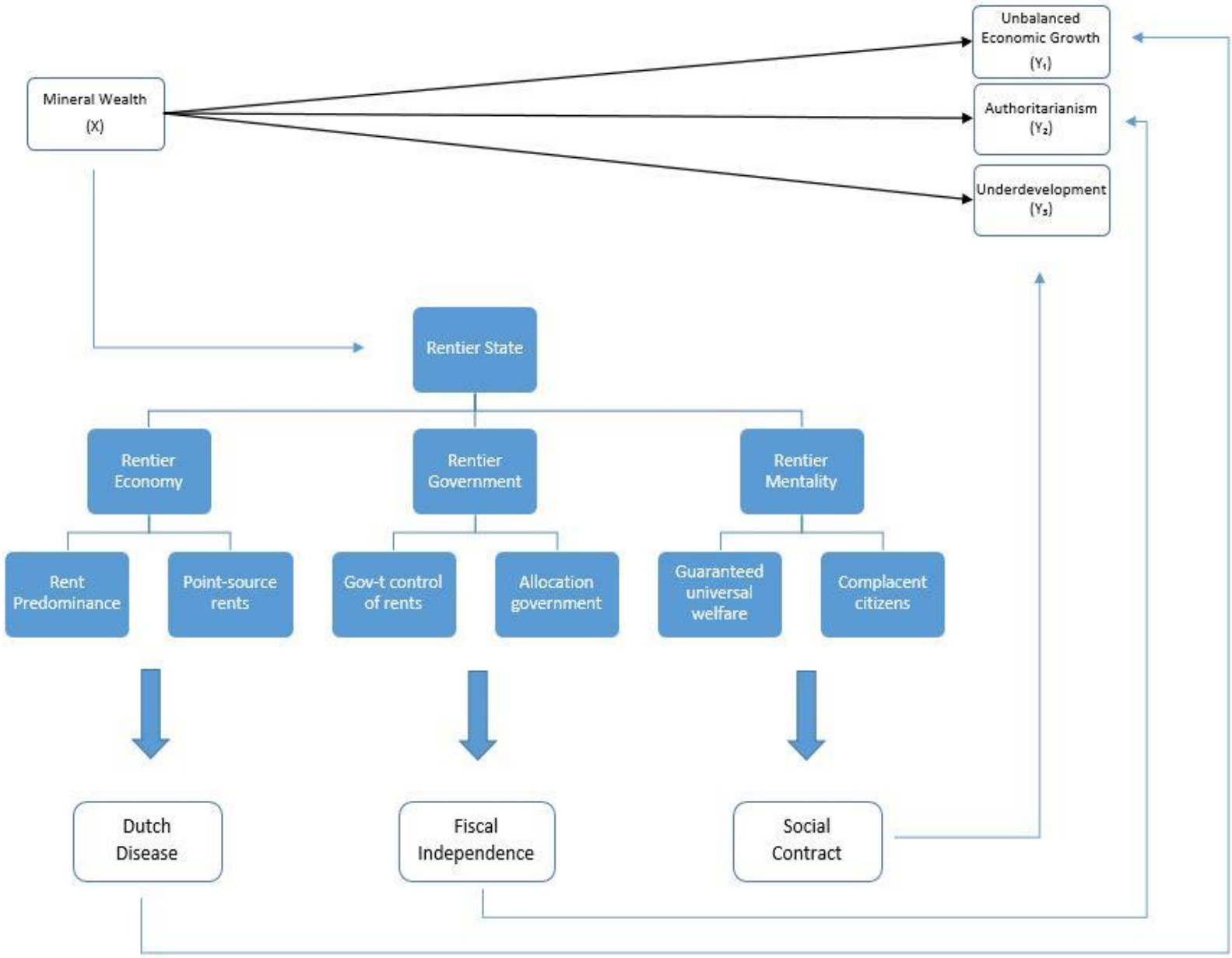

FIGURE 2: RESOURCE CURSE OUTCOMES AND RENTIER STATE MECHANISMS

Coined by Mahdavy in relation to the oil-exporting Arab states (Iran in particular) *rentier state* refers, in its broadest sense, to the state that "receives on a regular basis substantial amounts of external rent" (1970, 428). The definition of *rents* in this paper employs Ricardo's (1962) and Marshall's (1920) conception of rents as the income derived from "the gift of nature" which indicates the nature of rents being both scarce in quantity and differential in quality (Beblawi 1990, 85). By *state* Mahdavy means the wider social structure – the country, as opposed to the government.

Building on this conception, Beblawi and Luciani (1987) differentiate between *rentier economy* and *rentier state*. While their conception of the *rentier economy* is instrumental for the purposes of this paper, their formulation of the *rentier state* is problematic for two reasons. First, in their framework, the *rentier state* is a subset of the *rentier economy*. It makes little sense, however, to perceive of the state as a subset of the economy in the broader rentier state theory. For one, it could be as cogently argued for that the economy should be considered as a subset of the state because their interdependence. Beblawi and Luciani (1987, 4) are aware of this when they attempt to define the *rentier state* in rather broad and vague terms as a "combination of essential indicators describing the relationship between the state and the economy."

Second, with regards to the definition of the *state*, they, on the one hand, employ the dual definition where it is both the "overall social system" and "the apparatus or organization of government" (4). However, Yates' (1996, 13-14) examination of the authors' use of the term suggests that it is primarily the government that they assume in their discussions because Luciani refers to it as "the structure of power and authority that exercises the attributes of sovereignty within [a country]" and Beblawi uses *government* and *state* interchangeably.

To avoid this confusion, for the purposes of this paper, *rentier economy*, *rentier government* and *rentier mentality* (discussed later) are conceptualized as the three separate,

constitutive components of the overall social system – the *rentier state* as shown in Figure 2. Hence, the *rentier state* is defined as follows: *a country, the overall societal system that is premised on the regular inflow of substantial amounts of rents.*

2.2.1 Rentier Economy and Dutch Disease

To facilitate the above conceptual separation of government and economy as parts of the state, the slightly refined version of Beblawi's (1987, 11; 1990, 87-88) and Luciani's (1990, 51-52) definition of a *rentier economy* is employed; it is one with a) *predominance of rent situations* and b) the nature of these rents is *point-source*, meaning that there need be "only the few [that] are engaged in the generation of rent."

With regards to a), compared to major industrialized states, smaller developing economies that have abundant natural resources tend to increasingly specialize in extraction and export because these yield higher returns, resulting in predominance of such rent situations (Frankel 2012, 4). The level of economic dependence on these rents at which it is considered "predominant" is usually set depending on the context (Mahdavy 1970). Since most use the range of 20-40% of the economy, this paper considers 30% of GDP and higher coming from natural resource rents to be indicative of an economy with predominance of rents. Second, regarding *point-source rents* (b), minerals like oil and gas tend to be point-source, meaning that only a small portion of the working population is needed to generate them (Isham et al. 2005).

Taken together these facilitate a highly centralized decision-making process. Research shows that such point-source minerals hinder the creation and sustainability of institutions, in contrast to the manufacturing economies that depend on the larger population and the creation of institutions to create the wealth (Sala-I-Martin and Subramanian 2003; Bulte, Damania and Deacon 2005). Together the two factors constitute the rentier economy where the predominance of point-source rents results in little incentive to invest into manufacturing and industry, and leads to the Dutch disease and hence, unbalanced growth. The Dutch disease –

the shifting of production inputs to the mineral sector – reduces the competitiveness of the other export sectors like agriculture and manufacturing; it is the main reason behind the resulting unbalanced economic growth that is volatile and unsustainable in the long-run. As shown in Figure 3, this explanatory variable – Dutch Disease – is what links the rentier economy (and its indicators) to the negative outcome – unbalanced growth. Its other indirect effects are corruption, indebtedness and lack of productive long-term investment (Auty 2001; Gylfason 2001; Leite and Weidmann 1999).

2.2.2 Rentier Government and Fiscal Independence

Rentier government is one that is characterized by being a) the *principle recipient of the rents* (Beblawi 1987) and b) an *allocation government* (referred to as allocation state by Luciani 1987, 73). First, following from the government's monopoly on the legitimate use of force and the point-source nature of the rents, this enables the state capture of mineral revenues, hence making it the *principle recipient*. Second, unlike the production government that depends on economic growth and its working population for its main source of revenue – taxes, allocation government's revenue derives predominantly from rents. This means that it is free from the need to extract income from the domestic economy (Luciani 1987, 53). Its main role, therefore, is distributive – it simply allocates revenue, making its expenditure a substantial share of the GDP (70-71).

Together these factors create a fiscally independent government with inflated public sector expenditure and lack of accountability (73). This Fiscal Independence of the rentier government is the explanatory variable that links it to the negative political outcome – authoritarian regimes in resource-dependent states (Figure 2).

2.2.3 Rentier Mentality and Social Contract

Rentier mentality is the result of the break in the "work-reward causation" and non-conventional economic behavior in rents-dependent states (Beblawi 1987, 52). The Reverse Social Contract that emerges in states where a) the government provides *guaranteed universal welfare* (benefits, subsidies, income) and b) in return it expects *complacent citizens* to not interfere in its affairs and let it go about its business with little civic/institutional constraints is the cause of the break. One could argue that in these cases the citizenry taxes the government in a sense that it receives payments from the government in exchange for continued non-interference. Thus, the reward comes not from work, but rather from "chance or situation" – dormancy in this case (52).

The situation not only creates socio-political inertia (Mahdavy 1970), but also has profound consequences for productivity because it reduces incentives. This "psychological condition," as Yates (1996, 22) refers to it, leads to conditions where contracts are given not for economic rationale, but as an expression of gratitude, and civil servants' main job is simply physical presence in the office during working hours. Being a "serious blow to the ethics of work", it drastically reduces the general quality of goods and services, as well as standards of living within a community (Beblawi 1987, 8).

Other scholars have also emphasized the role of this type of Reverse Social Contract and the associated lack of incentives to create strong institutions in producing negative developmental outcomes in mineral rich countries (Jones Luong and Wienthal 2010, 3). Hence, the rentier mentality that comprises guaranteed universal welfare and complacent citizens produces the negative developmental outcomes in a society through the Reverse Social Contract that disincentivizes the population from effective participation.

3.
Methodology

The methodology of the paper is based on Rohfling's (2012) framework of an integrative comparative case study that includes first, a cross-case comparison and is then followed by a within-case study. A cross-case study of Turkmenistan and Kazakhstan based on the rentier state model formulated above, is carried out to determine causal effects (outcomes) through IMF and World Bank data set observations and applying standardized measures to the relevant indicators. If the rentier state components – the rentier economy, government and mentality – explain the resulting negative outcomes of the resource curse, then the cross-case comparison of Turkmenistan and Kazakhstan should show how exactly the cases vary across the six indicators of these components: rent predominance, point-source rents, government control of rents, allocation government, guaranteed universal welfare and complacent citizens. The cross-case comparison section determines the measures of the indicators and compares the cases across these to draw conclusions as to which indicators, and hence causal effects, vary across the two cases.

Next, the variance on indicators and causal effects will guide the within-case study of Kazakhstan in determining the process that resulted in the break away from the rentier model path (in contrast to Turkmenistan). It will identify the break in the causal mechanisms that link X to Y, as well as intervening steps through process tracing at the within-case level. Thus, measuring of the three outcome dimensions will facilitate the following analysis of causal mechanisms.

3.1 Case Selection

As was shown above in Chapters 1 and 2, the resource curse was found to mostly affect developing states that lacked strong institutions to begin with (Gelman and Marganiya 2010) –

making these states susceptible to the further formation of rentier states (and hence, the negative outcomes). Thus, when the Soviet Union abruptly disintegrated in 1991 and produced five newly independent petroleum-rich states with weak institutions – Russia, Azerbaijan, Kazakhstan, Turkmenistan and Uzbekistan – they were expected to follow this path (Karl 1999, 46; 2000; Sabonis-Helf 2004, 159-60; Amuzegar 2001). The fact that they did not uniformly follow the path allows not only for a study of this 'natural experiment,' but also for a closer look at the mechanisms through a small-n case study.

The cases of Turkmenistan and Kazakhstan – the two most similar cases at the outset in 1991 – are of particular interest for a case study comparison among the five new states because despite scoring the same across all of the relevant developmental factors, they followed to produce diverging results along the resource curse outcomes. More specifically, while Turkmenistan is reported as being a classical rentier state with indebtedness, bloated public sector and the worst development/poverty indicators in the region, Kazakhstan made efforts at shrinking the public sector, institutionalizing control over government spending, improved its business environment, fiscal sector and Human Development Index indicators (Crude Accountability 2009).

Similarities include, on top of being mineral-rich and resource-dependent, both Turkmenistan and Kazakhstan being classified as authoritarian states that inherited a legacy of command economies and weak institutions; they share a colonial past, the same neighborhood (Central Asia), a majority Muslim population, and the same number of years of independence. All of these factors have been previously associated with developmental and political instability outcomes in earlier research (Political Instability Task Force 2005; Marshall and Cole 2014). Another factor one is able to hold constant in this comparison is the international context because both states emerged as newly independent resource-rich countries at the same time.

With the substantive boundaries of the cases being rentier states, the population of interest here are resource-rich developing states with weak institutions – those susceptible to the resource curse. As mentioned above, the advantages of selecting the cases Kazakhstan and Turkmenistan as instances of resource-rich developing states with weak institutions, allows for high comparability through the control of relevant variables like colonial past, years of independence, postcommunist past, neighborhood, Muslim populations, and regime type. Temporal boundaries are set between 1991 and 2014 – the years of independence (there is lack of comprehensive data for years 2015 and 2016). Because the roughly identified differences are observed in comparing the two states at the outset of independence (early 1990s) and in the later 2000s, the cross-case comparison will use these two time-frameworks in specifying the differences in outcomes and further identifying the causal mechanisms.

3.2 Measurement

Overview of the resource curse literature suggests that dozens of definitions of "natural resources", and hence, ways of measurement have been used in previous studies. Ross (2014) identifies three important dimensions to most definitions. First is the type of the resource. Earlier work by Sachs and Warner (1995) and Collier and Hoeffler (1998) looked at broader measurements including agricultural commodities, petroleum and other minerals. More recently, however, agricultural commodities have been largely excluded from the definition of natural resources because these are usually produced, not extracted and are rarely associated with unfavorable outcomes. The only type of natural resource that has shown consistent correlation with negative outcomes is petroleum (Le Billon 2001, 2012; Ross 2003).

The second dimension of the natural resources definition is the salient quality of the resource. This refers, depending to the study at hand, to its value of production, quantity of

production, value of exports and/or the rents generated. Finally, the last dimension accounts for the method used in normalizing these values. It is usually up to the researcher whether one uses the measurement as a fraction of gross domestic product (GDP), of total government revenues, of total exports, or on a per capita basis (Ross 2014).

Although there is no single "best" measure, government revenues derived from the extractive industry have been identified as one of the potentially most important measures. The problem with these, however, is that there are many ways in which states may collect these such as royalties, in-kind payments, corporate taxes, bonuses, transit fees. On top of it, the revenues do not always accrue to the central government necessarily and the ones that are accrued may be concealed with relative ease.

Hence, this thesis employs the second-best, most widely used alternative measure to define "natural resources" – "the value of oil production per capita" (Ross 2008, 2012; Haber and Menaldo 2011). Following Michael L. Ross's (2014, 240) definition, "petroleum" in this thesis refers to both oil and natural gas, and "mineral (or oil) abundance" and "resource (or oil) wealth" to the value of a state's natural resource (or petroleum) production per capita.

4.
Cross-case Comparison of Turkmenistan and Kazakhstan

The cross-case comparison of Turkmenistan and Kazakhstan determines how they vary across the six indicators of the rentier state components: rent predominance and point-source rents (rentier economy), government control of rents and allocation government (rentier government), guaranteed universal welfare and complacent citizens (rentier mentality). It sets the measures and compares the two cases across all six indicators to draw conclusions on how they vary. Because performance across these indicators is not static across time and underwent changes in the 1991-2014 period, especially in the post-independency 1990s, the comparison is divided into two time series: 1990s and 2000s (up to 2014) to account for these changes.

4.1 Rentier Economy Indicators

4.1.1 Rent Predominance

The level of economic dependence on rents at which it is considered "predominant" is most widely set at 30% of GDP and higher coming from natural resource rents to be indicative of an economy with predominance of rents. Turkmenistan is a highly natural resource dependent country with total natural resource rents comprising 77%, 76%, 65%, 60%, 41%, 48%, 36%, 32% of GDP in the years 1994, 1995, 1997, 1999, 2009, 2011, 2012, 2013 (World Bank 2015). Given the state's closed nature and its unwillingness to share (and sometimes keep) crucial statistics and indicators, the data for the remaining years is not available. In addition to this, in 1998 the Turkmen government declared gas production figures to be a "state secret" and ceased publishing them altogether (Gleason 2010, 80). Nevertheless, it is safe to conclude that its natural resource dependence is well above the 30% of GDP threshold for both periods.

Kazakhstan's performance in this area is slightly different. Driven mostly by oil, its natural resource rent dependence fluctuated around 20% of GDP throughout the 90s before it skyrocketed from 11,7% in 1997 to 43,7% in 2000 and remained around the 30-50% range

since (World Bank 2015). Hence, it is resource dependent for the 2000s period, but not the 1990s as shown in the summary, Table 1.

4.1.2 Point-source Rents

Researchers find that the point-source extractive industries that have the tendency to lead to centralized decision-making and undermine institutional development through requiring only a small portion of the working population for its production are: minerals like oil and gas, plantation crops, coffee and cocoa (Engerman and Sokoloff 1997; 2000; 2012; Sala-I-Martin and Subramanian 2003; Bulte, Damania, and Deacon 2005; Isham et al. 2005).

First discovered and developed during the Soviet period, Turkmenistan's natural gas sector emerged as the driving force behind its economic development after its independence in 1991 (Gleason 2010). Turkmenistan is estimated to be the tenth largest gas producer in the world (Gleason 80, EIA 2008; BP 2007). The point-source resource sector not only retained its predominance in the economy, but exponentially increased its share over the years into the second decade of the 21st century. Natural gas revenues are notoriously easy to conceal from the general population and are particularly guarded in Turkmenistan, hence, it sustained a full rentier economy for both periods (Gleason 2010, 77-78).

In Kazakhstan another point-source resource – oil – is the main driver behind the economic growth that the country enjoyed since the Soviet times. It accounts for around 30% of its GDP, more than one third of government revenues and 60% of export revenues (IMF 2006; Lohmus and Ter-Martirosyan 2008, 64). Active production of the point-source oil began as early as 1970s consistently making Kazakhstan the second oil producer in the Soviet Union, following Russia (Raballand and Gente 2008, 10-11; Sagers 1994, 271).

4.2 Rentier Government Indicators

4.2.1 Government Control of Rents

Following from the government's monopoly on the legitimate use of force and the point-source nature of rents, this creates a conducive environment for the state capture of mineral revenues, making the government the principle recipient of the rents. This criterion holds for Turkmenistan throughout its independence. Having inherited and kept the centralized economy from the Soviet times and onwards, Turkmenistan's administrative apparatus claims control (and in many cases knowledge) of both the valuable reserves and the revenues they generate (Anceschi 2008; Gleason 2010, 79).

Although the Kazakhstani government also inherited the command economy with state control, the leadership chose to "sell off majority of its shares (>50%) in its production, refining and export facilities" to foreign investors in early and mid-1990s (Luong and Wienthal 2010, 259). Nevertheless, the government is still the main recipient of fiscal receipts and royalties from oil production that have accounted for about 20% of its general revenue since 2000. Oil exports brought around $2 billion to the budget and are expected to accumulate to $270 billion over the next four decades (IMF 2004, 18, 27; Najman et al. 2008, 111). The government's access to fiscal receipts was ensured through setting in place contractual terms favorable to it, whereby the government would, for instance, receive 80% of the oil production profits (as in the TengizChevroil contract with Chevron) and numerous other bonuses (RPI 1997/1998, 41-2; Petroleum 2001, 10; Jones Luong and Wienthal 2010, 267). Coupled with an increase in the number of foreign shareholders since mid-1990s, these figures suggest that the government has retained, if partial, control over the rents since its independence.

4.2.2 Allocation Government

Unlike the production government that depends on economic growth and its working population for its main source of revenue – taxes, allocation government's revenue derives

predominantly from rents. This liberates the government from the need to extract income from the domestic economy (Luciani 1987, 53). As a result, its main role is simply distributive, making its expenditure a substantial share of the GDP – at 50% and higher (70-71). In line with this definition, while denying its citizens basic rights and institutions such as civic initiative, freedom of expression, and independent judiciary and legislature through patronage networks, the Turkmen government regularly embarks on populist welfare initiatives like "free housing for everyone," universally free electricity, water, gas, heating and sanitation (Gleason 2010, 81). The government's main duties have reduced to some redistribution among its relatively small population while maintaining the status quo that has allowed top officials to secure billions of US dollar accounts in foreign banks (Global Witness 2006; BBC 2007). The public sector expenditure as a share of GDP remained at a high 75% (Nichol 2004).

The privatization of the oil sector in Kazakhstan led to somewhat different results. Attempts to bolster foreign investment and privatization in the 1990s led the government officials to pursue tax reforms that would attract investment by setting the legislative framework for business operations. The reformed 1995 Tax Code was assessed to be "the most comprehensive, most systematic, most modern, and most investor-friendly of any in the FSU [former Soviet Union]" by the Asian Development Bank (1999, 84). The Tax Code served as the basis for further reform to broaden the domestic tax base and reduce the reliance on the mineral sector. In addition, the government put in place measures to a) save the oil export windfalls rather than spend (including institutionalization of limits on public expenditure), and b) reduce the Dutch disease effects and investing in economic diversification. Results are not straightforward as on the one hand, the government's frugal and cautious fiscal stance was approved by the World Bank, but on the other, lingering non-transparency produced limited results and the broadening of the tax base was primarily confined to the indirect taxation and personal income tax from the energy sector (World Bank 2000, 4). Hence, in combination with

the mid-1990s fiscal/institutional reforms and mixed results, the public expenditure figures at around 20-25% of GDP since mid-1990s indicate that the Kazakh government has only partially performed as an allocation government since its independence (World Bank, 2008).

4.3 Rentier Mentality Indicators

4.3.1 Guaranteed Universal Welfare

Guaranteed universal welfare in the rentier state model means that the government guarantees welfare grids like benefits, income, and subsidies irrelevant of citizens' productive input. The Turkmen government to this day (from Soviet times) provides extensive and universal social protection including free gas, water, salt and other goods and services (Jones Luong and Wienthal 2010, 80, 101). Since independence, for instance, every citizen is entitled to a "substantial free gas quota," a variety of staple products like bread and milk for subsidized low prices, minimal and subsidized fares for public transport (Kamenev 2002, 177; EIU 2003, 21; Luong and Wienthal 2010, 101). An important feature of these subsidies and social protections is that they are delivered irrelevant of need or skill. Hence, the government guarantees pensions (at 62 for men and 57 for women) regardless of need and expects to raise these by 2020 to improve "general living standards"; wages are actively and universally increased throughout various sectors irrespective of the varying degrees of skill shortages across them (Auty 1997, 7; Dadabaev 2006, 124). More importantly, in line with what the rentier mentality phenomenon would expect, despite these "populist gestures" and exorbitant health and education expenditure (at more than 10% of GDP), citizens of Turkmenistan have the lowest life expectancy among the FSU states (IMF 1999; Kamenev 2002, 176; UNDP 2006).

Kazakhstan over the years has been consistently slashing not only its public expenditure, but also the Soviet-style universal subsidies that are still in place in almost all resource exporting states of the region. In contrast to Azerbaijan, Turkmenistan and Uzbekistan, it has minimized energy subsidies in its effort to contract the state's role and expand the role of the

private sector; it also implemented pension reforms to shift the burden of saving onto society (Becker et al. 2009, 210). The universal coverage of social sectors dropped dramatically in the early 1990s (World Bank, 2010). The country's HDI indicators, however, have shown a consistent upward trend over the years (UNDP, 2013). The government remains the principal provider of expenditure in sectors like education and healthcare, as well as the principal employer in many other sectors making it a partial guarantor.

4.3.2 Complacent Citizens

In return for the guaranteed universal welfare, *complacent citizens* in rentier states do not interfere in the government's affairs and let it go about its business with little constraint; the reward comes from chance or situation (dormancy in this case). Turkmenistan consistently scores one of the lowest in the world in Voice and Accountability measures (Worldwide Governance Indicators 2014). The government owns all media resources in the country, approves all content before publication, and appoints its own editors (Gleason 2010, 85). It has also been consistently cutting the number of years in public education – it is presently down to nine years in school and two years at university. Required curriculum replaced some standard subjects with the study of President Niyazov's personal memoir and spiritual guide *Rukhnama* (2005). The president, who renamed himself "Turkmenbashi the Great, the head of all Turkmen," also changed the names of the weekdays and months of the year after himself and family members (Gleason 2010, 81-82). Ornate monuments in Ashgabat, the capital city, commemorate his family and himself as the "greatest figure in Turkmen history" featuring other famous historical figures. More spectacular is the "Arch of Neutrality" monument featuring the golden statute of the president that rotates to face the sun at all times (Jones Luong and Wienthal 2010, 104). The president and his team enjoy popular support.

Indicators in Kazakhstan are not straightforward. Human Rights Watch reports that most media are owned by the members of the president's family or other powerful groups;

independent media outlets are regularly harassed and shut down, with hundreds of web sites being blocked on charges of extremism, libel and other technicalities; "self-censorship is common" (2015). At the same time, new independent outlets with critical political and economic commentary continue to emerge.

The civil struggle against the government took an acute turn in 2011, when the long-lasting protest by oil workers in the Western town of Zhanaozen demanding improved labor conditions and higher pay led to a violent government crack-down that killed at least 15 and injured more than 100, according to official reports (Demytrie 2012). Jager (2014) documents the workers' frustrations at their impoverished state, as well as at being locked in-between foreign companies that bought off "the country's wealth" and the state capital that benefits from lucrative deals but has little regard for the average citizen (502-503). While public attempts to hold the government accountable continue, decision-makers consistently make it clear that they will not shy away from use of violent force. In a similar fashion, Ziegler (2014, 45) notes the development of dual trajectories in Kazakhstan where the population with access to education and global mass media makes attempts at civil society formation, but the government's huge revenues appear to foster its independence from within and outside pressures.

Two pieces of information stand out from Table 1, which summarizes the cross-case comparison. First, the features that situate Kazakhstan apart from the classical rentier state model may be traced back to the 1990s when despite proven oil reserves and a volatile economy, it did not capitalize on these reserves, as was the case in Turkmenistan. Second, Kazakhstan never became a fully rentier state. Its early 1990s decision to launch the foreign privatization campaign set off a series of reforms that precluded the full development of the Dutch Disease, Fiscal Independence and the reverse Social Contract. The following section on the within-case study of Kazakhstan explains why it was slower to capitalize on oil production and why the

government opted for private foreign ownership that restrained it from forming a fully rentier state.

TABLE 1 CROSS-CASE COMPARISON SUMMARY

	TURKMENISTAN		KAZAKHSTAN	
	1990S	**2000S**	**1990S**	**2000S**
RENT PREDOMINANCE	**YES**	**YES**	**NO**	**YES**
POINT-SOURCE RENTS	**YES**	**YES**	**YES**	**YES**
FULL GOV-T CONTROL OF RENTS	**YES**	**YES**	**NO**	**NO**
FULL ALLOCATION GOVERNMENT	**YES**	**YES**	**NO**	**NO**
FULL GUARANTEED WELFARE	**YES**	**YES**	**NO**	**NO**
FULL COMPLACENT CITIZENRY	**YES**	**YES**	**NO**	**NO**

5. Within-Case Study of Kazakhstan

In discerning the factors behind Kazakhstan's divergence from the classical rentier state path, the cross-case comparison raised two questions: why the Kazakh government did not capitalize on the proven oil reserves in the 1990s as was the case in Turkmenistan, and why it opted to sell off majority of its shares in the oil sector to foreign companies. This chapter posits that the lack of alternative sources of revenue and the country's largest oil field reserves being highly difficult to extract has led the government to increasingly rely on foreign investors and technology. This explains both why the government was not able to launch large-scale production in the early years of independence and why it proceeded with the privatization campaign that set off a series of reforms limiting its powers. The chapter will first look at how

this private ownership structure came about, the main reasons behind endorsing it, and will then evaluate the more recent developments in the government's attempts to regain the centralized control of the oil sector.

5.1 Ownership Structure – Foreign Private Ownership

In the study of the five newly independent resource-rich states of the post-Soviet space Jones Luong and Wienthal (2010) posit that ownership structure – a factor largely ignored previously in the resource curse literature – provides the best explanation as to why they took diverse trajectories along the resource curse path. Hence, the main reason that Kazakhstan's path diverged from what the rentier state model would expect, lies in the early 1990s privatization campaign when the government sold off majority of its shares (>50%) in refining, export facilities and production to foreign oil companies (FOCs). In their view, variation in ownership structure produces varying results along the resource curse, whereby fiscal and legislative reform that went hand in hand with private foreign ownership led to the mediation of the resource curse.

Although as a newly independent post-Soviet state Kazakhstan inherited a command economy in 1991, the year also marked the initiation of a sweeping privatization program (Kalyuzhnova 1998, 69). The first FOC to conclude an agreement with the government was Chevron, whose 40-year joint venture allowed it to operate the Tengiz field, world's fifth largest active field, starting in 1993 (IMF 2003, 8). Three years later the government sold off another half of its shares (25%) to Mobil. In order to attract further foreign investment and facilitate FOC operations, throughout mid-1990s the government introduced appropriate legislative framework. The Law on Foreign Investment – first major piece of legislation to facilitate contractual stability and dispute resolution mechanisms for FOCs – was passed in 1994 (Slone and Lain 1995). Other pieces of legislation included the 1995 Law on Petroleum

and the 1995 Article 6 of the Constitution that reaffirmed private ownership rights over the country's natural resources. The year simultaneously marked the start of the full-blown privatization campaign with Prime Minister Kazhegeldin's announcement that FOCs would be able to acquire up to 90% equity in refineries and oil production associations (RPI 1995; Petroleum 2001, 8-9). By 2002 FOCs controlled 79% of gas reserves and 75% of oil reserves (Kusainov 2002).

Two indirect effects of the privatization campaign were fiscal (tax) reform and expenditure reforms that followed. First, the government's revisions to the Tax Code separated the tax regime into two distinct provisions – one for the general population and another, petroleum-specific tax code for the FOCs. The newly reformed general tax code aimed to broaden the tax base, which it did – government revenue from personal income tax (PIT) has been on the increase since 1998, though with certain limitations (the increase is largely attributed to petroleum related sectors (World Bank 2008, I). On the other hand, the governing elites' objectives in forming the petroleum-specific tax code was to ensure stable tax obligations on the part of FOCs.

To briefly mention some of the weaknesses of these reforms, interviews with FOC representatives suggest that the taxation regime has not only favored the government, but also proved to be rather unstable, unpredictable and lacking in transparency in the long-term (Jones Luong and Wienthal 2010, 266-69). These characteristics manifested themselves in numerous cases such as the countless amendments to the Tax Code (around 250 between 1994 and 2000), arbitrary environmental fines against FOCs that fall out of favor (Nurmakov 2010), and the siphoning off of billions of dollars in bonuses to a "top-secret Swiss account" under the President's direct control (Global Witness 2004, 15-16).

Second set of reforms – expenditure revisions – have ensured that contracts with FOCs included extensive obligations on their part pertaining to local content, social welfare, the

environment, and domestic market obligations. This allowed the government to not only reinforce changes to curtail its own public expenditures, but also to engage in the saving, rather than spending of the oil export windfalls, as well as institutionalize these reforms. While FOC representatives complain that they have been obliged to take on the role of the local government and to have "bought a community" instead of an oil field, this partly allowed the central government to set up a stabilization and savings fund – National Fund of the Republic of Kazakhstan (NFRK) that improved budgetary stability and accommodated the saving of more than 60% of increased oil export receipts (Jones Luong and Wienthal 2010, 274-275; Usui 2007, 3). In 2005 World Bank described Kazakhstan's fiscal stance as "remarkably prudent" and its public spending decisions as "cautious" and "frugal" (20; IMF 2004). NFRK also managed to keep the inflation relatively low and the real exchange rate stable, which together with the government's investment in the diversification of the economy made significant strides at reducing the Dutch Disease symptoms (IMF 2006, 4; ICG 2007, 25; Pomfret 2006, 57).

The tax reforms made the government less Fiscally Independent from the population by broadening the tax base. The expenditure reforms aimed at frugality hindered the formation of the reverse Social Contract characteristic of rentier states. Together these resulted in Kazakhstan only partially satisfying the conditions of a rentier state model.

5.2 Explaining the Choice of Ownership Structure

When it comes to the reasons why the government chose the seemingly least desirable private foreign control of the oil fields from the point of view of state sovereignty, Jones Luong and Wienthal (2010) propose a model that explains why the five post-Soviet mineral rich states chose their ownership structures. According to the model, convergence of two factors – low levels of alternative sources of revenue and high levels of distributional conflict – led the

Kazakh government to rely on private foreign ownership. Having few other revenue alternatives and facing distributional conflict – "potential opponents from an emerging cleavage" – the government opted to fall back on quick inflow of huge oil royalties and upfront payments from FOCs to swiftly consolidate power (Jones Luong and Wienthal 2010, 305). The model, however, has some flaws as it would expect Turkmenistan to opt for state ownership with significant foreign investor participation due to its low levels of alternative revenue and low levels of distributional conflict. Instead, the Turkmen government chose to retain its command economy with full state ownership and minimal foreign involvement which consequently contributed to its fully following the classical rentier state model.

Also, I suggest dropping the distributional conflict factor altogether because it plays a negligent role in the choice of the ownership structure. Even a highly autocratic state like Turkmenistan – that does not let such oppositional cleavages to arise in the first place and hence, keeps the distributional conflict at low levels – equally relies on the resource revenue to consolidate power just like Kazakhstan or any other state with higher distributional conflict. Thus, both states, whether with high or low distributional conflict have similar interests in the use and management of non-renewable resources; they have similar incentives and needs in maintaining power irrelevant of the degree of current distributional conflict. What does account for the difference in the choices of ownership structure once proven reserves are seen as the only potential revenue is how effectively the state is able to extract these minerals on its own.

The Turkmen government chose full state ownership because first, its state revenues depended on mineral reserves and second, it did not need significant foreign involvement in technology and investment in the production process. Kazakhstan oil fields, on the other hand, while also potentially significant contributors to the state revenue, are known as one of the more difficult to extract. Its largest onshore oil field – Tengiz – has reserves that are deep in location and high in sulfur making those both lower in quality and higher in difficulty of

extraction (Samoilov 2003). Thus, they require significant foreign participation and technological investment for both extraction and production. Given this need in technology and investment the Kazakh government had little choice but to launch the foreign investment and privatization program to successfully consolidate its power.

This also explains why in the 1990s despite known and proven oil reserves, Kazakhstan was not yet exploiting them to the full extent. Finally, the salience of the difficulty of extraction factor continued to manifest itself in the later years, when it prevented the Kazakh government from regaining ownership of the oil sector after it neutralized the distributional conflict in the 2000s, as discussed in the following section.

5.3 Attempts at Recentralizing the Oil Sector

Once the Kazakh government successfully consolidated its power and managed to obviate the oppositional and distributional pressures in the 2000s, the difficulty of extraction has continued to curb its attempts at recentralization and nationalization of the oil sector. The continuing technological and logistical dependency has meant the need for continued significant foreign presence with the main control of the oil cycle belonging to FOCs like Chevron, China National Petroleum Corporation (CNPC) and Lukoil (Palazuelos and Fernandez 2012, 36) despite the government's attempts to reverse previous agreements in its favor. Examples of the government's attempts to return to the prevalence of state ownership and control in the oil sector have been extensively documented by scholars (Nurmakov 2010; Ostrowski 2010). One of the telling cases was the one of PetroKazakhstan, with similar chain of events and tactics having been consequently employed in dealings with other FOCs.

As previously mentioned, foreign companies tend to have extensive social and economic obligations written into their contracts, such as fuel supply to local agricultural businesses during sowing campaigns. In 2005, PetroKazakhstan, a Canadian company also

known as “Hurricane Hydrocarbons”, refused to comply with such an agreement citing lack of transparency on the government’s part (Ostrowski 2010). With the disrupted sowing campaign and food shortages being possible outcomes in the worst-case scenario, the government unleashed on the company a pressure campaign, and later proceeded to acquire its shares altogether.

On initial stages, state agencies like the Environmental Prosecutor’s Office, the Ministerial Commission, National Security Committee (KNB, the counterpart of the former-Soviet KGB), the tax bodies, and the Anti-Corruption Agency launched criminal investigation campaigns, and imposed hefty fines of up to hundreds of millions of dollars (Nurmakov 2010). The concerted effort also proceeded to increase tax burdens based on selective application of flaring of associated gas charges and failed infrastructure investment commitments, as well as charging the company’s president with violation of anti-monopoly legislation. Later, as it surfaced that PetroKazakhstran reached a US$4.18 billion sale agreement with CNPC, the government negotiated directly with CNPC, acquired the company’s shares and signed a memorandum on joint management of its refineries (Shirinskih 2005; *Kazakhstan today* 2005; Nurmakov 2010).

While the ability of the government to launch such campaigns on a larger scale is significantly constrained by the dependence on investment and technology, such conflicts of national interest may be detrimental to the FOCs operations in the future and their presence in general. Of significant concern are cases of arbitrary and unsuitable determination of tax burdens, unilateral cancelation of contracts, abrupt legislative changes as well as retroactive application of laws (Konirova 2008; Nurmakov 2010). What such efforts and limited success on the government’s part show is that attempts at recentralization will continue, but will be significantly constrained by the industry’s continued dependence on investments and technology.

6. Implications and Limitations

6.1 Broader Implications for Resource Management

Most scholarly accounts on ways to obviate the resource curse usually assume that the government is the direct recipient of the revenues and hence suggest ways for the government to effectively manage the petroleum windfalls. Most popular of these include measures such as economic diversification, broad redistribution of revenues, creation of natural resource funds and measures to increase transparency, accountability and public involvement. However, these tend to increasingly fail because they almost always require the preexisting relatively strong institutions to aid the government in the process. As I mentioned previously in this thesis, however, most mineral-rich states that are in need of this assistance are usually developing states with weak institutions and hence, are not in a position to best benefit from them.

Two prominent examples of such failures are worth noting. First, as one of the ways to avoid the Dutch Disease symptoms and prop up other non-mineral industries international organizations such as the United Nations and World Bank advise policymakers on engaging in economic diversification of the petroleum windfalls (Katz et al. 2004; Sarraf and Jiwanji 2001). However, despite the wide following of these prescriptions on the part of the mineral-rich states (Davis 1995; Sachs and Warner 1995), they ended up producing adverse results instead of alleviating the resource curse (Auty 1990; Gelb 1985). This is because lacking the strong institutions that allow for transparent decision-making most investment decisions end up unproductive due to underlying political priorities or shaky economic grounds (Wienthal and Jones Luong 2006).

To give a second example, the World Bank and International Monetary Fund policy propositions aimed at creating natural resource funds to states like East Timor fail for similar reasons – lack of institutional capacities to support them. The main objective behind the creation of the national resource funds (NRFs) is two-fold – to reduce overspending by

stabilizing the spending patterns and to save a portion of the mineral wealth toward future generations (Davis et al. 2003). However, in order for these policies to take effect they have to be aided by existing strong institutions able to emphasize accountability, transparency and oversight such as an independent judiciary and professional bureaucracy. It is no coincidence, therefore, that the strongest and most effective national resource funds are usually limited to states like the United Sates, Norway and Canada – established mature democracies (Eifert et al. 2003; Wienthal and Jones Luong 2006). In cases of states like Venezuela, however, where a strong executive remains unbalanced and largely unchecked the national funds have produced opposite results. Complete discretion of the government over the fund resulted in periodic raid of the fund for adverse purposes like the further expansion of presidential discretion (Tsalik 2003).

In light of these major pitfalls of the policy suggestions aimed at aiding the governments to better manage their resources revenues, the findings of this thesis suggests that the choice of private ownership instead of state ownership might be better equipped to challenge the deeper-lying problems of mineral-rich developing states – lack of strong institutions. Some scholars (like Wienthal and Jones Luong 2006, 43) have also emphasized the advantages of private ownership in fostering the establishment of "formal rules of the game." Private owners have a vested interest in securing stable revenue streams and protection of property rights, while the government is more likely to invest in strong institutions in order to regulate the private sector and ensure stable revenues from it in forms of, for instance, taxation (42-45).

Apart from the case of Turkmenistan and Kazakhstan, the reforms within the Russian Federation also appear to support these findings. Following the Russian government's mid-1990s decision to privatize the oil sector while keeping under state ownership the gas sector, the two industries have fared along diverging trajectories in terms of economic reform. The oil industry – that was mostly privatized by the late 1990s – underwent significant deregulation

and restructuring resulting in subsequent jump in net profits and successful production expansion (Wienthal and Jones Luong 2006). Private owners also exerted pressure on the Russain government to ensure greater fiscal stability and transparency as well as liberalization of the economy. In contrast, the gas sector that remains under state ownership has resisted economic reforms and continues to suffer from foreign debt and accrue losses to the Russian economy (Wienthal and Jones Luong 2006).

The reasons that the petroleum sectors I have looked at tend to produce significantly better results under private ownership as opposed to state ownership appear to hinge on the formation of new relationships and institutional incentives under the former arrangement. Under conditions of private ownership, managerial performance is rewarded or punished based on objective criteria – maximization of profit and increase in efficiency. Hence, both the state and the private owners have interest in the creation of stable institutors to ensure transparency and accountability. State ownership, on the other hand, involves direct and exclusive access to the proceeds on the part of both the management and the government and involves the blurring of lines between the two. State-owned Gazprom has notoriously incentivized its bureaucrats to steal from the company because being de facto state employees they are not compensated for efficiency or profit, but rather have non-disruptive access to state revenue whether the company produces profit or not (Alchian and Demsetz 1972; Wienthal and Jones Luong 2006). Such blurring of state versus company lines produces bureaucrats and elites in favor of maintaining the status quo and resisting institutional change toward higher accountability and transparency (Wienthal and Jones Luong 2006).

6.2 Research Limitations and Further Questions

The first limitation of the research that should be addressed pertains to the resource curse scholarship in general, if not to the broader social sciences, where questioning of the validity

of the claims of causal outcomes and mechanisms is standard practice. Thus, although considerable evidence exists in support of the assumptive broad resource curse claims that this research builds on – such as the likelihood of petroleum wealth to prolong the existence of and support authoritarian regimes and rulers (Mahdavy 1970; Beblawi 1987; Chaudhry 1989; Crystal 1990; Bellin 1994; Yates 1996; Gause 2004) – the views of the resource curse skeptics should also be briefly mentioned. Many of the previous resource curse literature findings are based on statistical analyses and, as such, it is possible to question these basic assumptions altogether. By, for instance, specifying a condition under which a measure of natural wealth might lose its statistical significance (as with any independent variable).

Also, measures of natural wealth might be influenced by local decisions (such as petroleum revenues) and hence, endogenous to the outcomes like state weakness and authoritarianism. These maladies could, for instance, drive the studied countries to exploit and extract more mineral resources and produce biased estimates of petroleum effects (Haber and Menaldo 2011; Wacziarg 2012; Ross 2014).

Second limitation of the research derives from the dimensions and scope of the resource curse, which are rather fluid with no consensus on exact boundaries. Although the broad separation of outcomes into political, economic and social dimensions that I introduced facilitate a better ease and analytical clarity, there are other aspects of the resource curse effects that are studied in other disciplines. These include, but are not limited to, civil war (Collier and Hoeffler 1998; Basedau and Lay 2009; Collier et al. 2009; Bjorvatn and Naghavi 2011), international cooperation and conflict (Ross and Voeten 2012, Caselli et al. 2013; Colgan 2013), demographic trends (Bearce and Hutnick 2011) and the status of women (Assaad 2004; Ross 2008; Do et al. 2011).

Finally, there are numerous theories that suggest potentially salient mechanisms and conditions under which the resource curse operates to produce the different outcomes, but it is

notoriously difficult to separate and distinguish among these to establish which of them are the most salient. Not least because of the empirical challenges derived from the similar observable implications that these mechanisms and conditions might have (Ross 2014). A related question that has not yet been illuminated is whether and why various minerals appear to have varying effects. Could it be, for instance, that the prevalence of oil in the Kazakh energy sector and the prevalence of gas in Turkmenistan had a significant impact of its own in guiding the ownership structure? Is it coincidental that – in a similar fashion – the Russian oil sector was privatized and flourished, while the gas sector remained under state ownership and stagnant? Minerals may differ in many potentially significant ways in terms of their market volatility, labor intensity of the extraction, the generated revenue and physical characteristics. These might be consequential on their own and future research might shed light on whether and how the different characteristics might produce different ownership incentives and related outcomes.

Conclusion

The paradoxical tendency of mineral abundance to produce poor outcomes along economic, political and developmental dimensions result in continued efforts on the part of scholars and policymakers to explain and potentially manage the resource curse. With the United Nations Development Program, the World Bank and the G20 having launched initiatives to alleviate and manage the curse, it remains a salient issue especially in the former Soviet Union, Latin America, the Middle East and Africa. This thesis aims to illuminate some of the potential conditions and mechanisms that might be consequential in alleviating these maladies.

Because the curse was found to mostly pertain to developing states that lacked strong institutions (Gelman and Marganiya 2010) I concentrated on the former Soviet Union that produced five newly independent petroleum-rich states with weak institutions – Russia, Azerbaijan, Kazakhstan, Turkmenistan and Uzbekistan – upon its disintegration in 1991. The fact that they did not uniformly follow the projected path (Karl 1999, 46; 2000; Sabonis-Helf 2004, 159-60; Amuzegar 2001) allowed not only for a study of this 'natural experiment,' but also for a closer look at the mechanisms by means of a small-n case study.

The comparison of Turkmenistan and Kazakhstan – the two most similar cases at the outset (in 1991) – showed that unlike Turkmenistan, which developed into a full rentier state, Kazakhstan only partially satisfied the conditions. The within-case study of Kazakhstan further showed that the main reason behind the difference was the difficulty of extraction and production of its oil reserves that subsequently resulted in privatization and systemic reform. Both states were highly dependent on petroleum reserves as primary revenue generators, but due to difficulty of extraction and specificity of its oil fields, the Kazakh government had to heavily rely on foreign investment and technological/logistical support.

The launch of the large-scale privatization campaigns and selling of the majority shares in oil production and refinement to foreign oil companies set off a series of legislative, tax and expenditure reforms. The resulting institutionalization of the broader tax base and limited government expenditure went against the formation of a fully rentier state. Despite the government's more recent attempts at nationalization of the oil sector once it successfully consolidated its power in the 2000s, the oil sector remains highly dependent on foreign investment and technological/logistical support. Thus, although the government has made attempts at recentralization, its attempts are likely to remain unsuccessful due to this factor.

The implications of the thesis findings suggest that private ownership structure – and its observed positive impact – might help institutionalize reforms and better manage resource wealth in other mineral-rich developing states. This is because in comparison to other management policies practiced previously, the choice of private ownership as opposed to state ownership might be better equipped to challenge the deeper-lying problems of mineral-rich developing states – lack of strong institutions.

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