Why Arabs Rebel –
Relative Deprivation Revisited

Diplomarbeit
im Studiengang Politikwissenschaften in der Fakultät Sozial- und Wirtschaftswissenschaften der Otto-Friedrich-Universität Bamberg

Verfasser: Daniel Bischof
Do NOT quote without author’s permission

Erstgutachter: Prof. Dr. Thomas Saalfeld
Zweitgutachter: Prof. Dr. Johannes Marx
# Contents

*List of Figures*  
iii

*List of Tables*  
iv

*List of Abbreviations*  
v

1 Preamble  
5

2 Theorizing Collective Anti-government Actions  
9
  2.1 Deprivation Theory: The State of the Art  
  2.1.1 Patterns of Relative Deprivation  
  2.1.2 Critique of Relative Deprivation  
  2.2 Revisiting Relative Deprivation: Why Values Still Matter  
  2.2.1 Relative Deprivation Revisited  
  2.2.2 Towards a Synthesis: Critical Citizens’ Frustration  
  2.3 Revisiting Relative Deprivation: How Opportunities Might Matter  
  2.3.1 Rival Explanations: State-centered Approaches & Resource Mobilization Theories  
  2.3.2 Bringing Opportunities in: Political Opportunity Arguments  

3 Looking into the Arab States: Deprivation and Repression in Comparative Perspective  
39
  3.1 Morocco and Egypt in Comparative Perspective  
  3.2 Relative Deprivation in Morocco and Egypt  
  3.3 Regime Repressiveness and Absolute Deprivation in Authoritarian Regimes  

4 Operationalization: Cases, Data & Measurements  
53
  4.1 Case Selection  
  4.2 The Micro Model: Measuring Relative Deprivation  
  4.3 The Macro Model: Measuring Regime Repressiveness and Progressive Deprivation  
  4.4 What to do with time-series-cross-section-data?  

5 Analysis  
67
  5.1 Relative Deprivation in Morocco and Egypt  
  5.1.1 Political Deprivation  
  5.1.2 Economic Deprivation  
  5.1.3 Opportunity Structures  
  5.1.4 Summary: Toward a Dominance of people’s Perceptions?  
  5.2 Absolute Deprivation: What Macro Models Might Explain  
  5.2.1 Regime Repressiveness in Authoritarian Regimes  
  5.2.2 Summary: The End of Repression?  
  5.3 Comparison of the Micro and Macro Model  


<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Conclusion</td>
<td>88</td>
</tr>
<tr>
<td>Bibliography</td>
<td>90</td>
</tr>
<tr>
<td>Appendix</td>
<td>103</td>
</tr>
<tr>
<td>A.1 Appendix 1: Figures and Tables</td>
<td>103</td>
</tr>
<tr>
<td>A.2 Appendix 2: World Values Survey Questionnaire</td>
<td>110</td>
</tr>
<tr>
<td>A.3 Appendix 3: SCAD Data Coding Scheme</td>
<td>113</td>
</tr>
</tbody>
</table>
List of Figures

1 Davies' J-Curve Effect in Egypt, 1920-1950 .......................... 12
2 Link between Need Satisfaction and Revolution ...................... 13
3 Patterns of Relative Deprivation .................................... 17
4 Curvilinear Relationship between Repression and Protests ........... 35
5 Bayesian Learning ..................................................... 37
6 Anti-Government Actions in Egypt and Morocco, 1990-2011 ........... 41
7 GDP *per Capita* in Egypt and Morocco, 1990-2011 .................... 46
8 Anti-Government Actions and Repression in the MENA, 1990-2011 .... 50
9 GDP *per Capita* in the MENA, 1990-2011 .......................... 51
10 Sum of Anti-Government Actions by Country, 1990-2011 ............. 52
11 Case Selection ..................................................... 54
12 Collective Actions Targeting the Government in Northern African Arab States ................................................................. 104
13 Unemployment in Egypt and Morocco, 1990-2011 ..................... 105
14 Protest Activity: Missing Values ..................................... 105
## List of Tables

<table>
<thead>
<tr>
<th>Table</th>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Overview of References for Comparisons</td>
<td>22</td>
</tr>
<tr>
<td>2</td>
<td>Overview: State-centered Approaches</td>
<td>30</td>
</tr>
<tr>
<td>3</td>
<td>Overview of the Critical Citizen Concept</td>
<td>58</td>
</tr>
<tr>
<td>4</td>
<td>Characterizing Regime Types by Goldstone et al. (2010)</td>
<td>62</td>
</tr>
<tr>
<td>5</td>
<td>Impact of Political Expectations on Protest Activity (Bivariate Regression Analysis)</td>
<td>67</td>
</tr>
<tr>
<td>6</td>
<td>Impact of Political Deprivation on Protest Activity (Multivariate Regression Analysis)</td>
<td>68</td>
</tr>
<tr>
<td>7</td>
<td>Impact of Critical Citizen Concept on Protest Activity (Multivariate Regression Analysis)</td>
<td>70</td>
</tr>
<tr>
<td>8</td>
<td>Impact of Economic Factors on Protest Activity (Multivariate Regression Analysis)</td>
<td>73</td>
</tr>
<tr>
<td>9</td>
<td>Impact of Political, Economic &amp; Opportunity Structures on Protest Activity (Multivariate Regression Analysis)</td>
<td>75</td>
</tr>
<tr>
<td>10</td>
<td>Best Fit Models for Egypt &amp; Morocco (Multivariate Regression Analysis)</td>
<td>78</td>
</tr>
<tr>
<td>11</td>
<td>Anti-government Actions and Regime Repressiveness (Pooled Analysis)</td>
<td>81</td>
</tr>
<tr>
<td>12</td>
<td>Anti-government Actions and Regime Repressiveness; Two Periods (Pooled Analysis)</td>
<td>85</td>
</tr>
<tr>
<td>13</td>
<td>Summary Statistics of Micro Data</td>
<td>103</td>
</tr>
<tr>
<td>14</td>
<td>Summary Statistics of Macro Data</td>
<td>103</td>
</tr>
<tr>
<td>15</td>
<td>Hausman Test</td>
<td>106</td>
</tr>
<tr>
<td>16</td>
<td>Factor Structure of Democracy and Autocracy Items</td>
<td>107</td>
</tr>
<tr>
<td>17</td>
<td>Income Scale and Social Classification: Bivariate Regression</td>
<td>107</td>
</tr>
<tr>
<td>18</td>
<td>Impact of Political Deprivation on Protest Activity: Constant Sample Size (Multivariate Regression Analysis)</td>
<td>108</td>
</tr>
<tr>
<td>19</td>
<td>Anti-government Actions and Regime Repressiveness Two Periods C- &amp; T-Effects (Pooled Analysis)</td>
<td>108</td>
</tr>
</tbody>
</table>
List of Abbreviations

<table>
<thead>
<tr>
<th>Abbreviation</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>e.g.</td>
<td>for example</td>
</tr>
<tr>
<td>EU</td>
<td>European Union</td>
</tr>
<tr>
<td>GDP</td>
<td>Gross domestic product</td>
</tr>
<tr>
<td>MENA</td>
<td>Middle East &amp; North Africa</td>
</tr>
<tr>
<td>NA</td>
<td>Northern Africa</td>
</tr>
<tr>
<td>OLS</td>
<td>Ordinary Least Squares</td>
</tr>
<tr>
<td>PTS</td>
<td>Political Terror Scale</td>
</tr>
<tr>
<td>SCAD</td>
<td>Social Conflict in Africa Database</td>
</tr>
<tr>
<td>tscs</td>
<td>time-series-cross-section</td>
</tr>
<tr>
<td>UN</td>
<td>United Nations</td>
</tr>
<tr>
<td>USA</td>
<td>United States of America</td>
</tr>
<tr>
<td>WVS</td>
<td>World Values Survey</td>
</tr>
</tbody>
</table>
1 Preamble

On December 17th of 2010, a Tunisian street vendor named Tarek al-Tayeb Mohamed Bouazizi set himself on fire. This event started what later turned into a wave of protest and revolutionary situations throughout almost the entire Arab world. Some scholars even started to refer to these events as the “Arab Spring”, the “Arab Awakening” or even the “Arab Enlightenment” and described the Arab protests as a special event, which had been unforeseeable and surprised us all. Yet, I argue that these events were not as surprising as some scholars connote. Many observers noticed rising tensions within the region since the millennium: After the invasion of Iraq, many Arabs protested against American interventionist politics; an occupation of Lebanon by Syrian forces, which had lasted about 30 years, was ended during the cedar revolution in 2005; large scale protests took place in Egypt after the 2005 presidential elections; in 2007, from January until October, Moroccans throughout the country demanded an improvement of their economic living conditions; during the second Intifada, a wave of unrest was initiated with 203 marches and 73 demonstrations taking place in Jordan in the first week of October alone. The events starting in 2010 rather seemed to be the ending point of rising tensions during the last decade in the Middle East & North Africa (MENA) region. Instead of identifying the Arab spring as a number of events which started in 2010, we should rather focus on locating the Arab spring in a long chain of action, dating back years before 2010. In addition, the events during the Arab Spring seem to partly challenge the idea that protesters are primarily driven by opportunistic cost-benefit decisions: Numerous Self-burnings to keep protest activity alive even when facing large scale oppression by governments, and starting to fight state power against all odds do not seem to be actions of opportunistic agitators, but rather of frustrated people who are framed by their values and expectations for a different idea of living.

Therefore, this study tries to follow this approach. I try to establish a theoretical framework, which attempts to analyse protest activity not as a single event at a certain point in time, but as a complex combination of various factors. In so doing I review on three strands of social science literature. Firstly, I try to make a case for relative deprivation arguments. As I will argue, Gurr’s relative deprivation argument from 1970 gives us a deeper insight into the reasons for the Arab Spring. In 2011 Gurr appropriately noted, that: „[…] we need to begin by analysing the minds of men – and women – who oppose

---

1Ottaway and Hamzawy (2011); Schwedler (2003).
bad governments and unpopular policies.” I try to show that misunderstandings of these arguments and discussable methods contributed to “the fall of relative deprivation theory.” Secondly, I briefly reflect on cultural studies – especially on Norris’ (1999) critical citizen concepts – to identify that there seems to be a link often overlooked between relative deprivation arguments and the critical citizen concept: Political values might be more important for people’s protest activity than preliminary studies concluded. In so doing I claim that people who support certain democratic values and live under authoritarian settings become more and more unsatisfied with every single day of missing congruence between their value expectations and value capabilities. This frustration could bring them to the streets in order to demand democracy. Thirdly, I discuss various competing arguments – state centered approaches, resource mobilization theory and power contention theory – to locate pitfalls of relative deprivation arguments and develop a new approach towards the relationship between repression and protest activity. As I argue, people who are politically deprived might learn about the efficiency of their actions by gaining new information about the costs and benefits of protest activity. As I try to show, in so doing we not only gain fruitful insights into ordinary citizens’ motives, but also falsifiable hypotheses about the impact of their dispositions.

Furthermore, the wave of political activism in the MENA brings in a raft of new data, which might bring social science as a whole to rethink some theoretical assumptions and relationships between various factors. The following work uses polling data and data on the state level to show what we can learn from different data. The analysis is restricted to six arab countries: Mauritania, Morocco, Algeria, Tunisia, Lybia and Egypt. Yet, the micro data analysis deals with Egypt and Morocco in comparison and tries to show the impact of different economic and political factors on comparable individuals’ protest activity. In contrast, the macro data analysis deals with all six formerly mentioned states, tries to find similarities between all polities and discusses how repression might matter for protest activity throughout authoritarian contexts.

There is sparse academic research on the Arab spring. Articles published so far must be seen as snapshots or callow ideas. My diploma thesis tries to uncover citizens’ values and their subsequent motivations to take their demands to the streets. Therefore it concentrates on the political values and the political structure of Arab states. Of course other parts of the revolutionary puzzle need to be exposed: Diffusion processes within the Arab spring; regime reactions to the uprisings; the role of the military; especially

---

3Gurr (2011).
5In 1970 Gurr already pointed to this lack of falsification and to scholars’ misunderstanding of what science basically should be. Gurr (1970: Chapter 2).
1 Preamble

in Egypt;\(^8\) the impact of emotions;\(^9\) possible triggering events like the election in Iran or the ”cedar revolution” in Lebanon;\(^10\) or even the impact on the protests in Israel during 2011.\(^11\) However, many of these questions are more or less subject to speculation, since we still lack distinct information on repercussions of the Arab Spring for countries of the MENA. As a result, learning about citizens’ demands and the downstream motivational mechanisms behind them (for example (e.g.) the root causes for political uprisings) is the first step for further research. While these motivations have been subject to many studies, analyses using individual data in the field of revolutionary situations are rare, since most quantitative research focuses on macro data. Therefore my thesis aims to not only give fruitful insight into citizens’ motivations, but also to present new paths for discovering these motivations by combining micro and macro data.

What Is to Be Explained

The term Arab Spring – or sometimes even Arab Revolutions – is misleading: regardless of the present tendencies to widen the definitions of revolutions, the situation in MENA is elliptical and yet most “revolutions” are not even close to being over.\(^12\) Revolutions are rare events. Therefore research on revolutions follows mainly qualitative and historical perspectives. And there is good reason for these research methods: Revolutions are highly complex and tough to oversee. Nevertheless, nowadays literature on revolutions largely focuses on the process, outcome and scope of revolutions. Today scholars randomly discuss people’s grievances, so to say the starting point of revolutions. They discuss the impact of opportunity structures, tipping points and organizational structures, while largely neglecting people’s aspirations behind their actions. In so doing, researchers treat revolutions as special events, as a separate kind of social movement, different from riots, protest, uprisings and mass demonstrations. While this distinction is certainly correct when discussing the difference of the outcome and process of the latter, all these actions might have certain aspects in common. This thesis, however, neither discusses the outcome, nor the process of the Arab Spring. It discusses why Arabs rebel: My work tries to find which grievances Arabs might have in common and might lead them to protest against their rulers and governments. Therefore, I analyse collective actions of ordinary people against their government. Such actions can end up in revolution. However, riots, protests, mass demonstrations and strikes with the target goal to push governments to reforms are mostly the starting action of any revolutionary situation.

\(^8\)Barany (2011).
\(^10\)Kuntz and Thompson (2009).
\(^12\)Since a clear overview of the history of the term revolution is beyond the scope of this thesis, for a deeper discussion about the term revolution and its development see for instance: Yoder (1926); Siani-Davies (1996); Zimmermann (1981).
As a result I stick to the term “anti-government action” as my event of interest. I define it as collective action of citizens with the government as target. Anti-government actions are a broad concept and contain petitions, boycotts, demonstrations, riots, strikes and occupation of buildings. Yet, all events have in common that they grab the attention of the government and inform rulers about people’s aspirations, frustration and demands.

**Structure of The Thesis**

The structure of my thesis is straightforward. Firstly, I reflect on relative deprivation literature and present the state of the art of relative deprivation arguments in political science. Numerous critiques on relative deprivation will also be discussed. Secondly, I establish my own relative deprivation argument, which largely sticks to Gurr’s arguments, but differs in certain important details. Subsequently I illustrate why and how Norris’ critical citizen concept relates to relative political deprivation. Thirdly, I combine relative deprivation and power contention theory and develop what I call the “learning” hypothesis. The third chapter tries to transfer the presented theoretical framework into hypotheses by reflecting on the economic and political conditions in the six formerly mentioned Arab states. The fourth chapter presents the underlying data, its pitfalls, shortcomings and benefits. It also contains a brief discussion of methods being used to calculate a pooled data analysis of time-series-cross-section data. This is followed by my statistical analysis which is split into two models: A micro and a macro data analysis. The last chapter summarizes my results and outlines ideas for further research.

---

13 In order to improve readability, I use the terms uprising, protest, revolutionary situation and anti-government actions interchangeably. However, I mostly stick to the term “anti-government action”.
2 Theorizing Collective Anti-government Actions

In this chapter I argue that the combination of two schools of thought in political science – namely civic culture attitudes and literature on protest, revolutions and social movements – gives us a broader insight into the reasons and the shape of protest activity and uprisings within the Middle East. Firstly, I undertake a review of the theoretical development of relative deprivation theory. Secondly, I repeat critique on the classical relative deprivation literature and respond to critics in two ways: Showing that some critique bases on misunderstanding the concept of relative deprivation and creating my own theoretical framework, which builds on Gurr’s fruitful insights, but is enhancing and strengthening his arguments in a rational choice related framework. In so doing I show thirdly, that the so called “resource mobilization” arguments should not be separated from relative deprivation theory as strictly as they often are, since some ideas of the latter are implicitly used in relative deprivation arguments as conditional factors. The idea of the theoretical section is to develop a theoretical framework, which can be used to state clear hypotheses to be tested in a statistical analysis.

2.1 Deprivation Theory: The State of the Art

“A house may be large or small; as long as the neighboring houses are likewise small, it satisfies all social requirement for a residence. But let there arise next to the little house a palace, and the little house shrinks to a hut.”

Karl Marx
Wage Labour and Capital

As will be shown later, relative deprivation produced numerous academic works across social science disciplines. Unfortunately this has led to an almost random use of various
definitions of terms or even concepts of deprivation.\textsuperscript{14} Therefore the first step in my work is to illustrate what authors meant by relative deprivation, followed by my own theoretical thoughts on relative deprivation.

Today relative deprivation theory is largely of no relevance for political science. Like in most areas of political research, comparative research on revolutions undergoes certain waves of theoretical interests: Comparable to low tide and high tide, some theories gain scholars’ interest, while others flow out of researchers’ focus. Rising from Marxist theories, relative deprivation was \textit{en vogue} in the late 1960s until the late 1970s. After being challenged by critique of resource mobilization scholars – for instance Snyder and Tilly (1972) – it lost its influence for theorizing anti-government actions and revolutions almost entirely. But why digging it up in 2012? While this section gives an overview on some central arguments on relative deprivation, the following section tries to reanimate relative deprivation and make a clear case why this theory could be once more of large interest to scholars of collective action: The popular uprisings in the MENA region starting in 2010 seem to be largely carried by people’s political frustration and less by opportunistic decisions driven by cost-benefit calculations. Furthermore organisational structures and civil society are said to be weak in the MENA region. As these facts indicate anti-government actions in the MENA might largely dependent on people’s grievances and might lead to a reanimation of relative deprivation thoughts.

Ted Robert Gurr defined relative deprivation as: “[...] the term [...] to denote the tension that develops from a discrepancy between the “ought“ and the “is” of collective value satisfaction [...]”\textsuperscript{15} While most scholars like Gurr refer to Marx as the grandfather of the relative deprivation argument, de Tocqueville (1856) – one of the founders of comparative politics – posted the first argument which basically relates to the idea of relative deprivation, in his analysis of the French Revolution. He argued that after a long-lasting period of bad social and political conditions for the \textit{bourgoise}, the hint of improvement motivated the people to rebel. The situation slightly improved, which stimulated people’s minds to expect not only incremental improvements but a change of the whole social and political system.\textsuperscript{16} The French realized the huge discrepancy between their frustrating daily situation and their normative expectations how life should be via the slight improvement as a triggering event. In the 19th century, before Gurr came up with his idea of relative deprivation, the idea of “collective behavior” – mainly discussed by Blumer and Park (1927) – dominated literature on rebellions: Individuals, which were in some instances excluded from the rest of society, were sought to act emotionally.\textsuperscript{17} Rebels were declared to be irrational and regarded as threats to the stability of society.\textsuperscript{18}

\textsuperscript{14}Smith et al. (2011: 2).
\textsuperscript{15}Gurr (2011: 23).
\textsuperscript{16}de Tocqueville (1856: 214).
\textsuperscript{17}For instance, see: Park (1927).
\textsuperscript{18}Rule (1988: 91-118).
the 1960s theory on rebellion changed: Olson’s (1965) landmark study built on economic theory in developing a “rational choice” framework and consequently scholars reflecting on his thoughts, refused the idea of rebels’ irrationality. Furthermore, his ideas postulated why individuals’ grievances do not always end up in collective anti-government actions: While grievances might exist, people are often not capable of overcoming collective action problems and as a result collective actions only take place under certain circumstances. He argued, that people having grievances need certain structures of opportunities – numerous persons sharing their grievances; political structures providing situations favoring rebellions – in order to take their demands to the streets.

While literature on revolutions largely focused on other concepts than relative deprivation, some scholars already used the term in the 1950s. In pointing to Merton and Kitt (1950) it was the sociologist Davis (1959) who firstly established a precise theoretical framework around the relative deprivation argument. In his article Davis drew some important assumptions and defined what Gurr later enlarged by writing “Why Men Rebel”. Davis formulated five assumptions in a somewhat rational choice related framework: As a starting point we have to consider a society which can be divided into multiple dichotomous classes (for instance: students and non-students).\(^{19}\) Firstly, at least one of these fragmentations reflects a decline of acceptability for members of this society (the fragmentation argument). And one of these fragmentations splits the population into the deprived and the non-deprived, as a matter of fact with the former status being more desirable throughout society than the latter. Outside of the modeled society, this acceptance could be totally different.\(^{20}\) As an example: Being a salafist in Germany you might consider yourself as being a deprived group, since salafists do not seem to be as accepted in Germany as non-salafists. In contrast, being a salafist in Saudi-Arabia you might consider yourself as being a non-deprived group, as salafists in this particular society seem to have a huge influence and are therefore mainly accepted.\(^ {21}\) Secondly, the comparisons are random within society (the reference group argument), meaning, that we do not know who is comparing to whom. Comparisons take place all the time and \textit{ex ante} we cannot exclude a single comparison out of all possible comparisons. Davis’ assumptions three to five\(^ {22}\) relate to possible comparison twosomes and deduce the effects of these comparisons. Thirdly, if ego compares himself with alter and these two differ in their deprivation, ego experiences a subjective feeling of opposition to alter (the deprivation argument). This assumption directly leads to Davis’ definition of relative deprivation: If ego is deprived and compares himself to a non-deprived alter, the resulting situation will be called rela-

\(^{19}\)In the following section words written in parentheses and italic indicate how I will call the described assumption if I relate to them within the thesis.

\(^{20}\)Davis (1959: 281).

\(^{21}\)Since Wahhabism is closely linked to interpreting the Koran literally, just as salafists do.

\(^{22}\)The forth and fifth assumptions are not important to my work, therefore I will not discuss them here. For a complete overview, please see: Davis (1959: 283-285).
tive deprivation.\textsuperscript{23} Runciman (1980) broadens Davis’ precondition. He believes that what people want must be feasible.\textsuperscript{24} Yet, leaving us unclear about what he considers being feasible.

Davies (1962) was one of the first political scientists who combined deprivation with the evolution of a society. In contrast to Davis he used absolute deprivation to explain revolutions in three societies. In his landmarking article about the Russian (1905), French (1789-1799) and Egyptian (1952) revolutions Davies referred to Marx and argued that revolutions could mainly be explained by a so called j-curve effect. In dropping his argument he enlarged Davis’ arguments by regarding societies not as stable systems at one point in time: He tried to understand societies as ever changing systems. He concluded that revolutions are most likely to occur if a persistent period of economic and social growth is followed by a short period of harsh cuttings.\textsuperscript{25} Figure 1 illustrates a j-curve effect for the 23 July Revolution in Egypt. According to Davies, Egyptians underwent a time of rapid growth – with some little disturbances during World War II – until 1948, followed by a sharp rise until 1951 due to the Korean War.\textsuperscript{26} Unfortunately, the situation already changed during 1945 as one third of the working population lost their jobs, while due to the unfolding prosperity the costs of living had increased by three times compared to 1937. In the meantime the number of millionaires rose eight times during war. As a result the number of strikes and protests triggering social change and equality by citing

\begin{figure}
\centering
\includegraphics[width=\textwidth]{Davies-J-Curve-Effect.png}
\caption{Davies’ J-Curve Effect in Egypt, 1920-1950}
\end{figure}


\textsuperscript{23}Davis (1959: 283).
\textsuperscript{24}Runciman (1980: 10).
\textsuperscript{25}Davies (1962: 6).
\textsuperscript{26}The Korean war was responsible for an increase in cotton prices and therefore helped to build up a stagflation, since Egypt was one of the leading cotton exporters back then (Hansen and Nashashibi 1975: 32).
the holy Koran grew between 1946-48. Davies concludes that the war with Israel and the instability of the international system postponed the revolution. In his view these are not factors contributing to the revolution. The end of the “cotton stagflation” in March 1952 marked the triggering event for the military coup d’état led by Muhammad Naguib with the aim to end king Farouk’s reign. While his analyzing methods are worth discussing, Davies made a good point in trying to understand people’s aspirations and minds:

“The all-important effect on the minds of people in a particular society is to produce, during the former period [the prosperity period], an expectation of continued ability to satisfy needs – which continue to rise – and, during the latter [decline of prosperity period], a mental state of anxiety and frustration when manifest reality breaks away from anticipated reality.”

In summary: Davies believed that societies might see themselves as a reference group. As can be seen in figure 2 they compare their own status at $t$ with their status at $t_{-1}$ and arrive at the conclusion that they were less deprived at $t_{-1}$ than they are at $t$.

Figure 2: Link between Need Satisfaction and Revolution

\[\text{Source: Author’s own, based on (Davies 1962: 6).}\]

for the gap between $t$ and $t_{-1}$ springs from the ongoing rise of expectations and leads to the revolution in $t_{+1}$. To make a long story short, their expectations are not congruent

\[27\text{Davies (1962: 14).}\]
\[28\text{Davies (1962: 6).}\]
\[29\text{With } t \text{ being today; } t_{-1} \text{ indicating points in time before today; } t_{+1} \text{ indicating points in time after today.}\]
with their real living conditions. They are frustrated, demand change and want to act in favor of it: As a result, a revolution arises.

Hence, there is a large theoretical gap between both arguments: While Davis established a clear relative argument, Davies overlooked three cases – Egypt, France and Russia – by drawing on absolute data, for instance economic conditions. In so doing he linked absolute observations of the economic, political and social condition of a state with the people’s potential relative perceptions. Davies himself described how people might have perceived their situation, without knowing how they actually did. Therefore I conclude, that Davies designed a relative deprivation argument, but tested his arguments by using absolute deprivation measurements.

In building on the arguments of Davis and Davies, Gurr (1970) wrote a whole book dealing with theoretical assumptions about relative deprivation. He deduced falsifiable hypotheses and his work became an instant classic in political science. While the former cited definition of relative deprivation is intuitively understandable, Gurr used a whole chapter in order to define terms related to relative deprivation. He defined relative deprivation as: “[…] actors’ perception of discrepancy between their value expectations and their value capabilities.”\(^{30}\) With values being “desired events, objects, and conditions for which men strive.”\(^{31}\) Expectations are the average value positions of a society “[…] to which its members believe they are justifiably entitled.”\(^{32}\) They derive from past, present and future circumstances. Let us for instance consider the situation in Greece these days: People are protesting and demanding different economic circumstances out of two reasons. Firstly, they know what they owned before the crisis. Overall protesters feel they were better off. Secondly, what they expect from the future are at least the same circumstances as before the crisis. They might want even more than they possess today. Expectations arise from the past and refer to the present and future. It is important to note that expectations are justifiable: They reflect what men and women believe to be entitled to get as a collectivity, and are not a single visionary’s fantastic conceivabilities. Therefore the justifiability results from sharing value expectations with numerous persons: Anders Behring Breivik’s nationalistic expectations would not fulfill the justifiability clause, since they do not seem to reflect the expectations of a collectivity within the Norwegian society. They might be somehow justifiable for Breivik, but not for the rest of the Norwegians. Consequently, Breivik’s desired nationalistic future for Norway depicts his value expectations, but numerous Norwegians contradict them. As a result, value expectations need to be shared by numerous persons of a society to be justifiable in order to overcome collective action problems as we shall see later on.

Value capabilities are the average value positions of a collectivity, which the collectivity

---

\(^{30}\)Gurr (2011: 24).  
\(^{31}\)Gurr (2011: 25).  
\(^{32}\)Gurr (2011: 27).
“perceives capable of attaining or maintaining”. They also have past, present and future connotations: people’s *value positions* are dominated by what they attained themselves or gained from their surroundings in the past. Obviously, these value positions are not carved in stone: Reflecting from their value positions, their own skills and their social, political surroundings, people estimate what their future value capabilities might look like. These *value potentials* shall not be confused with value expectations: The latter is the value people strive for. Hence people might fail to reach their value expectations, because certain circumstances constrain their value expectations and therefore they never reach their expectations. In contrast people’s value potentials are believed to be reached even under certain constrains. Therefrom people are sure – at least from their subjective knowledge and information – that at a certain point in time these value potentials will be their value capabilities.\(^{34}\)

The final mechanism which motivates people to act is frustration. This discrepancy between value expectations and value capabilities is believed to be a frustrating psychological condition. Psychologist have shown in theoretical and empirical studies, that relative deprivation leads to frustration.\(^{35}\) If the perceived relative deprivation grows, the likelihood of antigovernment actions rises. However frustration is not a condition men and women strive for: They want to get rid of feelings of frustration and this is the reason why frustration might lead to action.\(^{36}\) Various psychological experiments underpin the linkage between frustration and action, while others reject the idea.\(^{37}\) For instance Kanin (1985) shows that rapists often act out of some sort of relative sexual deprivation. Nevertheless, psychologists still argue about whether frustration leads to aggressive action or any action at all.\(^{38}\)

### 2.1.1 Patterns of Relative Deprivation

As shown in figure 3, Gurr distinguishes between three patterns of deprivation: *Decremental* deprivation, *aspirational* deprivation and *progressive* deprivation. The latter follows the logic of Davies’ argument: The j-curve hypothesis as described above.

Decremental deprivation describes a situation in which people’s value expectations stayed relatively constant over time while the value capabilities declined substantially.

---

\(^{33}\)Gurr (2011: 27).

\(^{34}\)Gurr further distinguishes between actual and perceived value potentials. This differentiation is not of importance to my work, since relative deprivation is not analysed as a dependent variable. As an independent variable I will make certain assumptions later on where these value potentials might stem from, but will not run any analysis on it.

\(^{35}\)For instance Kanin shows that is a cause of rape: Kanin (1985).

\(^{36}\)Gurr (2011: 30-37).

\(^{37}\)For instance Smith et al. analysis a broad amount of relative deprivation publications and conclude that relative deprivation theory is of relevance, while often misinterpreted (Smith et al. 2011: 18 f.).

\(^{38}\)Kawakami and Dion show for instance, that the likelihood of collective action seems to be highly dependent on the reference group: If intra-group inequalities are high, the likelihood for collective action rises. Kawakami and Dion (1993).
People are frustrated because of the loss of what they once had. The gap between the value expectations and capabilities widens because of changes in people’s value capabilities, as shown in the third illustration in figure 3. In this case people use their own past as a reference point for their deprivation: They feel relatively deprived inasmuch their capabilities decreased and their value expectations stayed constant. To illustrate decremental deprivation, imagine a society having established a high standard of economic wealth with comparable high loans at $t_{-1}$. At $t$ the salaries stop to increase and from $t_{+1}$ on incomes start to drop and keep dropping. Korpi (1974) made the long theoretical story short in saying: “Decremental deprivation occurs in a situation where men’s expectations remain stable but where they receive less and less.” People get frustrated as they compare themselves to their own situation in the past and realize the gap between their value expectations and capabilities. Numerous authors used decremental deprivation to explain revolutions: Aristotle (Politiea) described possible revolutions in democracies and oligarchies as constructs following partly a decremental logic. Marx’ and Engels’ alienation argument builds on the idea of growing social welfare and its consequences: Machines replace ordinary mens’ and women’s’ jobs, which leads to a deprived situation for the proletariat as they are afraid of losing their jobs, furthermore destruction of workers’ pride since they no longer recognize the value of their work. Even the rise of Hitler and nationalism is often explained by a decrease of Germans’ capabilities during the Great Depression in the 1930s and Hitler’s skill to anticipate this as a situation of weakness for the German society. While decremental deprivation is often argued implicitly, explicit arguments of decremental deprivation are scarce in studies and largely limited to psychological experiments. Ross and McMillen (1973) show that decremental deprivation is more likely to assure social discontent than forms of constant deprivation: They changed the reference group between interpersonal and intrapersonal comparisons by setting two experiments with different circumstances. In the first experiment participants were provided with external references, while in the second one external referents where absent. As a result individuals reflecting on their own situation in the past are more likely to be dissatisfied than individuals referencing on other persons.

Aspirational deprivation relates to a lasting increase in men’s and women’s value expectations, while the experienced value capabilities stagnate on a constant level. As illustrated in figure 3 the value capabilities are stagnating on a constant level, while humans’ value expectations are on a lasting trend upwards. In $t$ people’s value expectations rise. Consequently in a later point in time $t_{+1}$, the gap between expectations and capabilities is bigger than in $t_{-1}$. Furthermore it reflects the idea that a certain amount of the

43Ross and McMillen (1973: 448).
expected value has already been achieved. On this account people might believe that the excess of that value might also be justifiable: They get used to a certain value and start to expect more of it as they believe this value might further improve their way of living. For example: An autocratic regime can have implemented elections, while these elections are more or less selections, meaning they are far from being democratic. As a consequence, people could expect further moves of their rulers to liberalize the political system. The event of a single change could be used as a triggering event to expect more of a certain value in the future.

The most frequently cited and explicitly used pattern of relative deprivation is the progressive deprivation, the so called j-curve effect – which has been already addressed and explained in detail. Not only social scientists trying to explain collective actions, but also psychologists, historians and economists built on Davies’ and Gurr’s ideas as well. Yitzhaki (1979) deduces that the gini-coefficient poses – at least mathematically – an equivalent to the relative deprivation argument. In addition Snyder and Tilly (1972) test whether progressive deprivation can explain collective violence in France starting in the 19th century.

As this section showed, relative deprivation theory has been used in broad areas of science to explain very different circumstances. As this might have been a gift for the academic popularity of the relative deprivation concept, it also had significant negative consequences by in bringing in numerous critics of the relative deprivation concept. That being said, relative deprivation arguments slipped from political scientists’ focus. The 1970s and 1980s were dominated by work on opportunity structures and state-centered approaches. This change of theoretical thought also brought a modification in methods: While prior to the 1970s work on protest and revolution often built on quantitative anal-

\[\text{Source: Author’s own, based on Crosby (1979: 107).}\]
yses, from the 1970s till today case comparative studies have prevailed.\textsuperscript{46} Moreover if research on deprivation is done on people’s frustration this literature relates to the so-called “grievance” literature.\textsuperscript{47} Disappointingly – as the following section will show – scholars confuse relative deprivation with thoughts on grievances and absolute deprivation.\textsuperscript{48} This misapprehension might have underlined what Brush calls “the fall of relative deprivation theory”.\textsuperscript{49}

2.1.2 Critique of Relative Deprivation

The following section establishes three main arguments, in favor of reconsideration of relative deprivation theory might bring fruitful benefits: Firstly, revolutionary situation or anti-government actions start in people’s minds. How people experience and reflect reality is crucial for solving their identified problems. Relative deprivation might provide the necessary tools to theorize humans’ aspirations. Secondly, the main critique of relative deprivation theory – frustration can be seen everywhere, but revolutions are scarce – is based on an empirical rather than a theoretical argument. Therefore it might constitute a challenge for relative deprivation theory, but certainly not devastate all its theoretical relevance. Furthermore this argument builds on a misunderstanding of relative deprivation theory: While critics often mistake theoretical arguments of relative deprivation theory, some scholars using relative deprivation theory lack to identify adequate measurements for relative deprivation. Thirdly, I argue that scholars largely reduced relative deprivation theory to a mainly economic argument, while overlooking other important aspects of relative deprivation.

While theories of rebellion until the 1970s largely reflected on individual motivations, Tilly (1978) showed in a historical analysis of France that collective violence is the consequence of groups competing for power within a society. Tilly reflected less on individuals’ aspirations and more on opportunity structures. He stated that people begin with reflecting on cost and benefits of their collective actions: They calculate whether their actions will be successful and if not they will not rebel against all odds. He criticised that Gurr’s arguments underestimate the impact of reactions by the state apparatus and overestimate individual frustration. As a matter of fact he concluded in his review on “Why Men Rebel”:

“Gurr’s scheme meets the need by summing up the total discontent in a population, wherever it is located. The likelihood of political violence, then, is a direct function of that total. The less that model applies, the less Gurr’s

\textsuperscript{46}Goldstone (2001: 165).
\textsuperscript{47}Please see amongst others: Collier and Hoeffler (2004).
\textsuperscript{48}One of the most prominent articles to do so, is: Collier and Hoeffler (2004).
\textsuperscript{49}Brush (1996: 524).
frustration → aggression argument tells us. I think it applies very little."^50

Tilly’s harsh critique might have been premature, since the concept that people oppose political order in response to experienced injustice seems initial plausible: Neither Political scientists nor ordinary persons would refuse this argument. Nevertheless, there were situations throughout history when citizens did not rebel against their rulers even though they might have felt relatively deprived. In contrast, indubitable collective actions against the state apparatus are always linked to some sort of dissatisfaction: People could be dissatisfied with their current economic situation or dissatisfied with the share of power between their ruler and themselves.^51 Still rebellious situation could occur, which are less driven by relative deprivation, but by opportune cost-benefit situations. Like Tilly’s work on France shows.^52 Therefore scholars of relative deprivation find themselves in a field of tension. On the one hand they run risk of explaining nothing, because the universal proposition that relative deprivation explains collective action against the state can be falsified easily by one opposing case. On the other hand they run risk of not uncovering new information to the reader, because the latter already knows that people felt certain dissatisfactions or these dissatisfactions were not crucial for the collective action event.

However, arguing that throughout mankind’s history deprivation appeared without people rebelling against their rulers does not falsify the relative deprivation argument. On first sight these arguments seem convincing, but there are good reasons to refuse them. Firstly, we have to wonder if this thesis is really an empirical fact. As has been noted individuals judge whether they are relatively deprived: Observers need to ask ordinary people about their judgement on their living conditions. We cannot estimate relative deprivation by analyzing key data on the economic or political situation in a country. If we do so, we are no longer think about relative, but absolute deprivation.^53 A person who is relatively deprived might not be absolutely deprived or vice versa. Let us have another look on the first sentence of Marx’s argument at the beginning of this chapter. Imagine an ordinary family living in a house, which fulfills any modern requirements for nice living. From an absolute point of view there is no reason to consider this family as being economically deprived. Now read the second sentence of Marx’s argument: Imagine their neighbors live in a palace. Henceforth the situation seems to be slightly different: If the ordinary family compares itself to their neighbors, they might feel relatively deprived. Unfortunately this misunderstanding enjoys great popularity: Gurr measured relative economic deprivation with import-/exportrates and costs of living and unemployment; Muller and Weede (1994) used GDP per capita to estimate relative economic deprivation.^54 In their

^50Tilly (1971: 419).
^52Tilly, Tilly and Tilly (1975).
^53For a deeper look into the difference between relative and absolute deprivation, see for instance: Canache (1996).
reanalysis of the j-curve effect Miller, Bolce and Halligan (1977) concluded rightly, that scholars underly the “regrettable tendency to test a theory based on individual perception with aggregate and objective data.” Crosby (1979) is right when he notes that relative deprivation appears in different patterns. Therefore rejecting Davies’ j-curve effect does not necessarily mean that relative deprivation theory is of no relevance for social science. As long as critics focus on studies which do not clearly undertake analyses on relative and individually measured deprivation, this critique in relative deprivation theories walks on shaky legs. Maybe some critics of relative deprivation theory might answer: “This differentiation is pettifoggery!” But Alain (1985) conclusively shows in his experiments that feelings of dissatisfaction depend more on relative rather than absolute criteria.

These measurement issues are directly related to another issue of relative deprivation literature: Scholars prevalently reduce the theory to a mainly economic argument. While Gurr’s frustration argument takes numerous possible deprivations into account – economic, political and social deprivation – scholars often reduced Gurr’s argument to simply analyzing economic deprivation. Just as with Davies’ j-curve effect they analysed economic deprivation and neglected social or political deprivation. This might result partly from the uncomplicated accessibility of economic data. Access to data on social and political aspects is more often restrictive or even worse, they are not available for certain time periods or countries. But this argument is subject to speculation. However, scholars’ focus on economic reasons for deprivation is not. Although these scholars might provide a deeper look into economic factors leading to collective actions, they underestimate political and social conditions of Gurr’s deprivation argument. Necessarily the hardening on economic factors by scholars of relative deprivation encouraged critics of relative deprivation theory to postulate the identical illegitimate reduction to show possible shortcomings of relative deprivation theory.

To this day most of the criticism explained above remains unanswered. Nevertheless – as has been explained – the fall of relative deprivation theory gave room to the search for further factors which might explain revolutions and collective anti-government action. In the following section I reflect on ideas of state-centered approaches, which mainly dominate analyses on revolutions. Before doing so, I establish my relative deprivation framework to analyse anti-government actions in Northern Africa (NA) and try to address some of the criticism of relative deprivation.

55Miller, Bolce and Halligan (1977: 981).
56Crosby (1979: 104-107).
58For Instance Yitzhaki concludes that the gini-coefficient perfectly measures the ideas of relative deprivation, see: Yitzhaki (1979).
2.2 Revisiting Relative Deprivation: Why Values Still Matter

In the following section I will draw on the described concepts and establish my own theoretical framework to theorize anti-governmental actions. Some theoretical and critical arguments within the last section are picked up and addressed. My framework is not necessarily a new approach to relative deprivation research. Nevertheless it sharpens some relative deprivation arguments and posits that relative deprivation theory is far from being done in social science: I try to show, that relative deprivation can still be a fruitful approach to analyse why people rebel against state power and state actors. Generally speaking, relative deprivation theory is important for two major reasons. Firstly, scholars of rebellion largely focus on why people act. They focus on opportunity structures and organisational skills. As a matter of fact the start of the rebellions in the MENA region were not supported by organized groups in most cases. It rather seems as if they were underpinned by individual actions which displayed triggering events for other individuals: Mohamed Bouazizi set himself on fire on December 17th 2010 and many Arabs followed his lead. Considering these events, relative deprivation theory might give us a hint out of which reasons Arabs rebel, focusing on individuals expectations and values. It focuses on people’s aspirations, in contrast to most other theories on rebellions which focus mainly on the event of action itself: When did people take action? Which form of actions would rebels take? Where did these actions diffuse to? et cetera. Secondly, quantitative research on collective anti-government protest is scarce. Scholars largely investigate single or comparative case studies. In so doing they give fruitful insight into the processes within revolutions. But they oftentimes neglect citizens’ aspirations for rebellion or fail to build generalizable and falsifiable hypotheses. Therefore my framework aims to overcome these two problems by focusing on individuals’ values and expectations and by establishing falsifiable hypotheses.

2.2.1 Relative Deprivation Revisited

This section describes my overall analytical framework. I argue, that relative deprivation consists of six theoretical steps. Like Davis, I use a somewhat rational choice related game between two players to illustrate my theoretical ideas. As a matter of fact both players do not necessarily need to be single persons. Both can – and sometimes should – be interpreted as collectives. Nevertheless my illustration is written in singular to simplify the understandability of my argument. The following section describes the steps of the framework, before I conclude that the critical citizen concept is related to classical relative deprivation ideas.

Firstly, let us focus on the players in my game. My approach illustrates two players: A citizen “C” and his or her ruler “R”. I model both actors as rational in the sense of their
goals: They set themselves certain aims, which they want to achieve by certain means, which they take into consideration through cost-benefits calculations. Nevertheless, the overall thesis largely focuses on C’s decisions, while R’s will be mostly excluded from the framework. Similar to Davis, my starting point is an imaginary society. As in Davis model, my society can also be divided into different dichotomous subgroups, to which I earlier referred to as the fragmentation hypothesis. The next step relates also to Davis. In this society comparisons are random, meaning for example C compares with R and vice versa. This has earlier been called the reference group argument. Meanwhile my argument about references does not stop at that point. While Davis might be right, to the point that comparisons are random and we cannot exclude different comparisons a posteriori, we can definitely make certain assumptions about certain comparisons, which might result in deprivation, without excluding others.  

Table 1 illustrates four possible comparisons. Firstly, C can compare himself with himself at an earlier point in time. This is Davies’ concept for his j-curve argument.

<table>
<thead>
<tr>
<th>Comparison</th>
<th>Reference Group for Comparison</th>
<th>Example in Literature</th>
</tr>
</thead>
<tbody>
<tr>
<td>Self</td>
<td>Oneself at earlier point in time</td>
<td>Davies’ j-curve</td>
</tr>
<tr>
<td>Instate</td>
<td>Persons living within same society</td>
<td>Marxean idea</td>
</tr>
<tr>
<td>Outstate</td>
<td>Persons or objects outside of own society</td>
<td>Diffusion</td>
</tr>
<tr>
<td>Normative</td>
<td>fanatic ideas or values, utopia</td>
<td>-</td>
</tr>
</tbody>
</table>

Source: Author’s own.

Secondly, C can compare himself with individuals living in the same society, but under different circumstances: In the Marxean argument people compared themselves with a richer person. In this case C compares himself with R or any other C. Beyond that we can imagine people comparing themselves to situations in other states. This might not have been less plausible back in the 1960s and even 1970s, since transaction costs for information have been much higher than today, where people communicate via the internet or get an idea of people’s lives in other countries by watching television. This gradually changes our former postulated game. There is not only a society ‘A’ with citizen ‘C’, but also a society ‘B’ with citizen ‘C2’.  

Therefore C might also compare himself to C2. Basically this idea stems from diffusion literature, but is often stressed implicitly whenever people talk about the impact of modern communication channels during the Arab Spring. It emphasizes the idea that people not only learn from their nearby surroundings, but also

---

61 My argument is not about all possible comparisons. I am only discussing comparisons, which might end up with one of the participants feeling relatively deprived. Additional comparisons are definitely more comparisons thinkable.

62 To keep the game as easy as possible I am only considering one more society.
from information they seek about people living far away: Ideas diffuse across borders.\textsuperscript{63} C could also compare his situation with normative thoughts about certain aspects of life. Let me call this the Breivik comparison: Breivik believed that he had to protect his home country against Islamization. He had the fanatic idea that his country needs to be freed from foreigners in order to stay successful. This idea is devoid of any foundation, it is an utopia. While this comparison to utopia might appear, it will most likely not end up in collective, but rather in individual deprivation and therefore single actor action: It seems rather unlikely that a collectivity shares the same utopia at the same point in time. As Gurr and Runciman both noted: Relative Deprivation most be justifiable, in the sense of Gurr, that it is shared across a collective. If a single persons feels solely responsible to undertake terrorist events, these actions are not justifiable. Yet, this brings us to the point relating to collective action problems discussed by Gurr and others. They stress the difference between individual and collective relative deprivation. The more people share the same deprivation, the more likely action might be: with every person sharing the same deprivation the costs of action decrease and the possible success increases. If C is the only one feeling deprived, costs of action appear to be high and benefits from action low. If other Cs share his frustration, the costs of action and the benefits are shared in a collectivity. Therefore costs appear to be lowered for the single individual and the probability of success appears to be higher. Therefore my theoretical argument only discusses collective relative deprivation. As explained in the introduction, the dependent variable to be explained are collective anti-government actions. This implicitly excludes terrorism, assassinations or any other kind of individual violent action with the aim to influence or overthrow the government.

In contrast to Gurr I rather define values as a person’s enduring belief that a certain state of existence is personally and socially preferable to any other given alternative.\textsuperscript{64} The reason for not adopting Gurr’s definition adheres firstly with the term “desired”: There are a lot of things desirable – like desiring some ice-cream – without being a value. Therefore values need to be stable across a certain period of time and not depict people’s short term desire. Therefore values are “enduring”, they are not changeable over night. If a person holds a certain value it will be stable over medium or long term and not change in short term.\textsuperscript{65} This assumption sounds trivial but is of essence for my analysis, as will be shown in the methods section.

So far this thesis stressed the idea that relative deprivation does not only appear in different patterns, but that different sources could also play an important role. While many scholars throughout political and social science stress economic deprivation, political

\textsuperscript{63}For a broader explanation of diffusion concepts, please see amongst others: Dobbin, Simmons and Garrett (2007).
\textsuperscript{64}Rokeach (1968: 550).
\textsuperscript{65}Page and Shapiro (1992).
and social deprivation are also possible. Relative political deprivation is defined as the discrepancy between people’s political expectations and their capabilities. For instance C could have experienced a period of liberalisation of political rights and therefore hold increased expectations towards a democratic society in A. Unfortunately R changes her mind and restricts C’s freedom. As a result, C feels relatively politically deprived. Relative economic deprivation relates to the same aspect for C’s perceived economic capabilities and expectations: Maybe C experienced a longer period of rising pay checks, but due to economic crisis the pay check of today is smaller than the one of last year. Last but not least, relative social deprivation is defined as the discrepancy between people’s social expectations and their capabilities. Maybe C is excluded from social life within his environment: Due to racist resentments he always has to sit in the back of the bus, since he is black. Every other day he steps into the bus, white people point their fingers at him and force him to sit in the back row. Therefore C’s value expectations are not fulfilled, he feels socially deprived. All these deprivations might end up in frustration. Yet, the upcoming section tries to illustrate why we can differentiate between these frustrations ex ante, which is basically a new approach to think how people’s frustration might become collective action.

Implicitly the salience of the source is important to feel deprived. If C is not into politics at all, it seems irrational for him to feel deprived because of politics. C might not have any political value expectations, since he never thought about what is worth pursuing in politics. Therefore I believe the salience of the source of deprivation is important if we analyse relative deprivation. This relates to addressing criticism which can be found in Tilly’s or Olson’s work: As both argued, relative deprivation theory does not link people’s frustration with their actions. People rationally estimate their costs and benefits of actions. Thus they might be deprived, but still will not act, since the costs of the potential action outweighs its benefits. The patterns of my approach are congruent to Gurr’s: aspirational, progressive and decremental relative deprivation. Yet there are two reasons, why I only overlook progressive deprivation. Firstly, as the hypotheses section shows, there is good reason to believe that Arabs are largely motivated by progressive deprivation. Secondly, since relative deprivation is my independent variable, the focus on the analysis is the estimation of the impact of relative deprivation on anti-government actions. As has been mentioned earlier, analyzing relative deprivation as an independent and dependent variable is beyond the scope of this thesis.

The last assumption relates to the target of actions out of frustration. If people are frustrated, do they know whom to blame for their frustration? Even if people might know the source of their deprivation, they cannot always be sure whom to blame for it. In the case of political deprivation it seems to be clear who to blame. If C compares his political capabilities to his expectations – wherever they arise from – he most likely will blame R for his possible relative political deprivation. Since R is ruling C, she appears the one to
be blamed for. Therefore it seems rational, that in case of political deprivation, C will blame R for his deprivation. The target of C’s frustration will most likely be R. In the case of economic deprivation the target of frustration seems to be more difficult to detect. If C feels a discrepancy between his economic capabilities and expectations, R is not necessarily the one to blame. C could also hold his boss at work responsible for his stagnating salary. This is a matter of state structure, since in some autocracies R will most likely also be the one to blame for economic deprivation, because autocrats often not only control political, but also economic power. If it comes to social deprivation C might be confused: Who is to blame for me always having to sit in the back row? The Bus driver? The other passengers? Myself? It seems rather unclear who to blame for social relative deprivation. In most instances C won’t know who to blame for. One solution for this issue is to be use the same mechanism as the white oppressors do: Stereotyping. But even in that case, blacks most likely will react to the next white person they see on the street. Therefore the target of frustration action could be chosen randomly: He could kill himself or the bus driver or the next white guy walking down the street or kill nobody and keep living under oppression. While it might not seem unlikely, that he finds persons sharing his social deprivation, it seems rather unlikely that the collective will challenge state power, but rather chose their targets randomly. In summary we can establish a rank ordering of the targets of relative deprivation: we can rather be sure that the targets for political deprivation most likely are the politicians in charge. Therefore actions will most likely confront the political establishment by taking demands to the street. Depending on the political system we can sometimes be sure about the target of economic deprivation, while the target of actions resulting from social deprivation seem unsure, and often randomly chosen. As a matter of fact, the relationship between the source and the target of frustration is influenced by the amount of people sharing the same deprivation at the same point in time. It seems likely that politically deprived persons share their deprivation with other people, since the source for feeling politically deprived is the same: The source are aspects of the political system. These aspects might be interpreted differently across a population, but still the measure for the value capabilities are the same. This does not hold true for economic or social deprivation. In both cases people across one society have different jobs and different social circumstances. It seems less likely that at a given point in time many people share the same kind of economic or social deprivation. Once again we can imagine – depending on the political system – that people might share a common economic situation in one political system and therefore blame their rulers. But it seems unlikely that people at a given point in time all share comparable social deprivation. Social deprivation rather seems to be individual relative deprivation and in most instances is not sharable across a collectivity. Therefore my analysis does not cover social deprivation, since I do not believe this argument is important for an analysis of possible collective actions. And out of these theoretical considerations, political deprivation seems to be most likely to end up
in collective actions with a clear target.

2.2.2 Towards a Synthesis: Critical Citizens’ Frustration

Let us summarize the theoretical argument presented earlier. Firstly, people living in one society are dividable into dichotomous subgroups. Secondly, people randomly compare each other. Thirdly, we can think of four comparisons important for feelings of deprivation: self comparison; instate comparison; outstate comparison and normative comparison, with the last one being ignored for this thesis, as has been explained. These forms of deprivation can develop out of three different patterns: Aspirational, progressive and decremental deprivation. And these patterns may have three sources: Political, economic or social sources. The salience of the sources is important: If persons are not interested in the source of deprivation, they are unlikely to feel deprived. Furthermore, while the target for actions resulting of political deprivation seems to be clear, the target for economic deprivation depends on political systems and the target for social deprivation often seems chosen randomly. Therefore social deprivation is excluded from the analysis. This section focuses on political deprivation and what political deprivation appears to be. I argue, that political deprivation is somehow related to the civic culture studies and especially Norris’ (1999) critical citizen concept.

Preliminary findings on revolutionary situations often fail to establish falsifiable theses on the micro-level of Coleman’s famous bath tub. This gap in revolutionary research is partly due to the hitherto applied methods for analyzing revolutions, that is focusing on case studies. Goldstone rightly notes, when referring to quantitative analysis:

“[.] it is those factors that affect the strength of the state, competition among elites, and popular living standards that determine the stability or instability of the ruling regime. It may be hoped that this new generation of quantitative studies will reinforce and enrich, rather than rail against, comparative case studies.”

Rational choice models addressed this problem – focusing on the macro-level explanations and therefore ignoring micro-level processes – by presenting the theoretical foundations to explain how individual ideas end up in collective action. Still most of these studies do not provide falsifiable hypotheses, but rather focus on historical arguments. In order to overcome these pitfalls, my framework tries to take citizens and their beliefs into account. As I will try to show, learning from studies of civic culture might be the solution to fill this gap: There seems to be a potential link between relative deprivation and civil culture studies that has widely been overlooked, as I outline in the following section.

---

67 Karklins and Petersen (1993)
68 McAdam, Tarrow and Tilly (2004).
Almond and Verba (1965) were the first ones to use the term “civic culture” to characterize citizens’ values and attitudes, which they address to be crucial to underpin democratic systems. In an effort to reinforce the academic discussion on civil attitudes, Inglehart challenged Verba and Almond’s idea of civic culture by bringing in so called “self-expression values”.69 He concluded – more or less convincing – that people’s self-expression values explain – besides the former mentioned civic culture values – another part of the puzzle of democratic stability. While up to then most studies of civic cultures focused on the stabilization of democracies, Huntington’s idea of the so called “clash of civilizations”70 paved the way for new research on civic cultures in young – and even non-democratic systems. All these publications share the idea that mass political attitudes have a profound impact on the stability of democracies or the process of democratization: They believe a viable democracy depends on an equilibrium between citizens’ values and the output of political institutions.71 So why should this concept not be applicable to non-democratic regimes? Generalizing their argument implicates that state structures which contradict citizens’ attitudes are not stable. In other words: Such states might be confronted by citizen’s actions demanding congruence between their beliefs and the political institutions.

Unfortunately the studies cited often fail to approve their hypothesis of higher democratic support ending up in more democratization.72 Furthermore they neglect an additional yet crucial question: Which citizens do not only support democratic values, but also strongly disapprove of any other idea of political system? This idea is of significant importance: There is a huge gap between supporting democracy or supporting democracy and refusing any other form of political system.73 Pippa Norris has addressed this question by publishing the “critical citizen.”74 Norris proved that citizens supporting democracy in form of disapproving of any other given political system idea are the critical ones to reinforce democratization.75 While critical citizens scholars clearly state the differentiation between support of and demand for democracy, they have not established a coherent theoretical framework for analyzing anti-government actions, which is not surprising since this has never been the declared aim of civic culture studies. Therefore literature on the impact of democratic values on protest structures – especially in authoritarian settings – is scarce.76 The critical citizen concept includes two dimensions: Firstly, critical citizens usually support democracy and reject any other political systems idea. Now let us reconsider the relative political deprivation argument: Individuals are supposed to have

69 Inglehart and Welzel (2003)
70 Huntington (1998).
71 Qi and Shin (2011: 246).
72 One of the most recent doing so: Hadenius and Teorell (2005).
73 Qi and Shin (2011: 246).
74 Norris (1999).
76 For a review of the literature please see: Guérin, Petry and Crête (2004: 372).
certain value expectations. Basically these value expectations are described by the first step of Norris’ critical citizen argument: Their political value expectations are to support democracy and reject any other form of political system. Secondly, critical citizens need to evaluate their political system: They need to critically decide whether they are satisfied with their political institutions. This second step of the critical citizen concept describes people’s value capabilities.

In sum, Norris’ critical citizen concept equates to my relative political deprivation argument. Hence – as my data and measurement section will show – my critical citizen must not only be critical "on paper”, but also willing to take his demands to the streets: He must support, demand and as a result act in favor of democracy. Being frustrated about the performance of any given political institution does not necessarily mean people will act in order to change these political shortcomings, as mentioned above. They must be willing to communicate their demands in order to test whether their government will act in favor of or against their political preferences.77 In redefining the concept of critical citizens I try to address the eligible criticism pointed out by rational choice scholars concerning relative deprivation studies and civic culture studies: Believing and acting are two separate concepts. Yet, my framework lacks possibilities to take collective actions into account: for instance Karklins concentrates on the idea of tipping points. That is: when do people decide to join a protest or uprising?78 For this reason the major limitation of my conceptual framework is that it is not capable of interpreting the archetypes of individuals’ changing decision in the eve of uprisings. But even for overcoming the well known Olsen free-rider dilemma, people firstly need a topical interest in protesting to begin with. That is they need to be frustrated or displeased with a given circumstance.79 Otherwise there is no need to overcome collective action problems, because if people are pleased with their living conditions and environment, they will not see any reasons to join a protest movement at all. Therefore my argument largely reflects on people’s aspirations and not on their choice of acting or not acting. I want to reflect on the reasons deep in protesters’ hearts and not on their rational decisions making on the eve of revolutionary situations.

My work tries to use the ideas described so far of civic culture studies to fill the former mentioned gap of falsifiable micro explanations in social movements theories and work on revolutions. Therefore my concept follows a two step logic: First there must be people living in the Middle East who contradict the state structure they are living in. On first sight this argument sounds kind of trivial. But using critical citizens as an independent variable leads to neglecting why critical citizens might also exist in non-democratic regimes. According to the logic of the civic culture study, running across

79Olson (1965).
critical democrats in non democratic regimes seems almost unrealistic, as civic culture theorists believe in people’s attitudes being dependent – at least to a major extent – on the state structure and not *vice versa*. As has been explained in the last section, a look into relative deprivation literature gives us a hint as to how citizens in non-democratic regimes could be largely affiliated to democratic ideas: In order to feel frustrated, people need a reference point to compare their actual living conditions to. In 1970, Gurr still believed people use their direct surroundings to get a sense of their possible capabilities, in 2011 this idea seems rather obsolete.\(^8^0\) As mentioned earlier, globalization has not only brought a diffusion of economic capabilities, but also the spreading of ideas, values and knowledge.\(^8^1\) Therefore, people living in the Middle East might compare their situation to Western democracies, to themselves in an earlier state of time or even simply to their neighboring countries. While many scholars use the diffusion theory to describe the dispersion of the Arab Spring, they are not analyzing which references citizens might compare themselves to, so to speak: They are explaining diffusion processes *within* the Arab Spring and not diffusion processes bringing ideas *into* the Arab Spring. Thus they fail to explain which circumstances led to the revolting based on a feeling of being less free and living under less democratized state structures than others.\(^8^2\) Living as a critical citizen in a autocratic state could end up in feeling politically deprived: It is likely that someone who supports democracy and rejects autocracies will not be satisfied living under autocratic rule. He or she might feel a discrepancy between his or her value expectations and value capabilities, therefore might be frustrated and believe there is need for action to get rid of his or her frustration.

### 2.3 Revisiting Relative Deprivation: How Opportunities Might Matter

> “The integrity of China was more important than [the people] in Tiananmen Square!”
> 
> *Muammar Qadhafi in his last speech to his followers*

The following section illustrates some rival explanations for revolutions and collective actions against governments. As a matter of fact reflecting on all competing arguments

\(^8^0\)Gurr (2011: 25).

\(^8^1\)For instance see: Weyland (2009); Weyland (2005).

\(^8^2\)Way (2011).
is beyond the scope of my thesis. Therefore I briefly illustrate the most well-known and famous arguments within social science. In the second section I argue that some of the rival ideas might partly also explain collective anti-government actions in the MENA region. But instead of objecting these rival explanations, I try to include some of the ideas into my relative deprivation argument. I conclude that some of the obviously rival arguments might be closer to deprivation arguments than they seem to be.

2.3.1 Rival Explanations: State-centered Approaches & Resource Mobilization Theories

As state-centered approaches show, the state structure might underpin motivations to confront the political system. As you can tell by the name, state-centered approaches focus on the possible impact state structures have on anti-government actions: States constrain and shape economic, social and cultural phenomena.\(^{83}\) These approaches believe that such mechanisms are more important for large scale anti-government actions than for instance relative deprivation. As can be seen in table 2, Goodwin subclassifies the state-centered approaches into four categories:\(^{84}\) a state autonomy perspective, an infras-

<table>
<thead>
<tr>
<th>State-centered Approaches</th>
</tr>
</thead>
<tbody>
<tr>
<td>Perspective</td>
</tr>
<tr>
<td>State actors develop autonomy. Therefore risk legitimization.</td>
</tr>
</tbody>
</table>

\(^{83}\)Goodwin (1997: 9).  
\(^{84}\)Goodwin (1997: 10 f.).
Theorizing Collective Anti-government Actions

Russian, French and Chinese revolutions focuses on the relationship between the reigning state actors and dominant and subordinated classes within the state.\textsuperscript{85} In the end, she concludes, politically organized and administratively cross-linked classes have triggered the revolutions in France and China.\textsuperscript{86} The infrastructural power perspective is concerned with explaining revolutions by estimating the capability of states to pull through political agendas, even if faced by potent oppositions. If the state is capable to do so, revolutions are unlikely. Scholars of this branch analyze military power, fiscal situation and organizational reach in order to estimate the survival chances of states.\textsuperscript{87} The third branch concentrates on the ability of states to fragment or even destroy oppositional movements. Tarrow (1994) suggests that movements try to anticipate the chances of success of their protest actions. Since states control certain opportunity structures – instability in the ruling elite; division within elite groups –, collective action against leaders depends on the opportunities given to protesters or revolutionaries. The striking argument of the so-called resource mobilization theories revolves around how protesters can expand their chances to be successful in challenging the polity: by building on organizational structures such as unions, revolutionary parties or grass-roots movements.\textsuperscript{88} Therefore these approaches rather focus on revolutionary dynamics and leaders’ tactics – so to say on the possible event itself – than analyzing the very beginning of actions.\textsuperscript{89} According to the Tocquevillian approach, states’ competences in forming values and identities of citizens play a key role in explaining revolutions. As has been mentioned previously Tocqueville’s idea seems closely related to relative deprivation arguments. Nevertheless the most challenging arguments against relative deprivation arguments stem from resource mobilization arguments. Tarrow, Tilly and implicitly Olson seem to be the godfathers of critique on relative deprivation arguments: Their perspective overemphasizes rational decision making over any sort of grievances, norms or values. At the end of the day people are rational decision makers, who rather act on opportunistic decisions than to get rid of their frustration. However – as has already been mentioned in the introduction – people setting themselves on fire or joining grass-roots protest on Tahir Square seem to have overcome or overlooked collective action problems. The situation in the MENA region since 2010 challenges collective action arguments in a rare manner in regard to scope and depth.\textsuperscript{90}

Similar to relative deprivation theory, state-centered approaches are intuitively appealing for explanations of collective anti-government actions, since revolutionary situations

\textsuperscript{85}Skocpol (1979: 31).
\textsuperscript{86}Skocpol (1979: 110-111).
\textsuperscript{87}See, for instance: Mann (1984).
\textsuperscript{88}Opp (2009: 127-129).
\textsuperscript{89}McCarthy and Zald (1977: 1213).
\textsuperscript{90}As the following section will show anti-government actions in the MENA have been existing throughout the whole period of observation of this work. They do not seem to be rare events, rather everyday struggle of ordinary people.
obviously need a state to be overthrown: “[…] No states, no revolution.”91 Unfortunately, the criticism on generality of the relative deprivation argument can also be assigned to state-centered approaches: If state structures are the crucial factors for revolutionary situations, why are so many states not capable of fulfilling the required tasks to prevent revolutions in order to avoid being overthrown by their citizens if they are capable of anticipating which state structures are important to be fulfilled in order to not be overthrown? And if state structure approaches build more complex theoretical frameworks – like Skocpol – they often end up in explaining one case, but fail to explain a broader variety of cases.92 As a result most of the studies formerly mentioned overlooked a small case selection. In consequence most of these approaches largely seem inappropriate to analyse anti-government protests in the six Arab states overlooked by this thesis. They might be fruitful for describing the evolution of revolutions in certain Arab states, but will most likely fail to postulate theses which will not be rejected if we do not analyse a small numbers of highly comparable cases.

The huge difference between these approaches and relative deprivation arguments is the believe that people’s grievances about a political system are necessary, but not sufficient conditions for anti-government actions. State centered approaches believe that it is the state structure which determines people’s actions. However, the gap between state centered approaches and relative deprivation might not be as clear as it seems. Relative deprivation arguments do not necessarily need to consider state structures explicitly, because they always do implicitly. As has been shown in the last section, people’s deprivation needs a source and this source can be the political system which people live in. As I lined out previously political deprivation might be relatively more important than economic or social deprivation, as people’s political deprivation relates to the same source: The political system they are living in. Therefore people’s political deprivation always reflects on state structures. It is people’s evaluation of state structures which leads to political deprivation and sometimes ends up in anti-government actions. Seen from that perspective relative deprivation might provide a more volatile approach to the evaluation of state structures, since we no longer use the judgement of experts about certain political conditions, but the judgement of ordinary people living in a certain state. From this point of view, relative deprivation and the state structures seem to have a common point of interest, which is analysed from two different perspectives: While relative deprivation theory follows a bottom-up approach putting people’s grievances in the focus of interest, state-centered approaches follow a top-down approach by reflecting mainly on state

---

91 Goodwin (1997: 12)
92 For a deeper overview of this critique please see: Geddes (1990: 141-145). As Geddes points out the underlying problem of Skocpol’s analyses is her case selection. Skocpol selected her cases on the dependent variable, which brings her to the argumentation that her theoretical framework is not falsified. Geddes conclusively shows that Skocpol’s assumptions must be rejected if we analyse other cases.
structures.

2.3.2 Bringing Opportunities in: Political Opportunity Arguments

Resource mobilization theories built the ground for an enormous amount of criticism on relative deprivation arguments. In their groundbreaking study on resource mobilization and social movements, McCarthy and Zald (1977) observe:

“The ambiguous evidence of some of the research on deprivation, relative deprivation, and generalized belief has led us to search for a perspective and a set of assumptions that lessen the prevailing emphasis upon grievances. We want to move from a strong assumption about the centrality of deprivation and grievances to a weak one, which makes them a component, indeed, sometimes a secondary component in the generation of social movements.”

Based on the ideas of resource mobilization studies, the so called “power contention theory”, which became the leading theoretical framework for analysing anti-government actions since the 1970s and for critique on relative deprivation arguments, focused on the possibilities of state powers to constrain people’s political activities. These scholars largely reject the idea that grievances of any sort have important impacts on anti-government actions. Power contention theorists rather argue, that deprivation might have an impact, while opportunity structures are more important for people’s actions. They conclude that the organisational structures of discontent and the state capabilities to suppress anti-government actions are the important factors which motivate anti-government actions. Summing up they reflect on the opportunity structures for protest, which they conclude are the driving forces for protests and revolutions. The first question which we need to address relates to the opportunity structures itself: What are opportunity structures?

Opportunity structures seem to be a rather elusive concept. Opp (2009) promotes a differentiation between two definitions of opportunities in existing literature: An objectivist definition defined as “environmental changes that change the objective likelihood of goal attainment” and a subjectivist definition positing that opportunities exist if the perceived environment changes. As has been mentioned, most research on opportunity structures tries to explain one or a few cases. In so doing scholars largely point to certain variables as being important for a single case, but lack a clear definition of what the term “opportunity” actually means.

93 McCarthy and Zald (1977: 1215).
95 Muller (1985: 48).
I define opportunity structures as people’s estimated possibility to influence the decision making of their governments, therefore my definition leans towards the subjectivist definition. This definition involves both citizens’ legal and illegal actions to influence their governments. Yet, with the latter being perceived more costly throughout different polities, since executing illegal actions or even unconventional participation might be followed by punishment.\textsuperscript{99} I will return to this argument later and challenge this cost-benefit assumption. As resource mobilization theories argue, people’s perception of these opportunities vary across social subgroups: Members of political organisations or worker unions often differ in their perception of political opportunities from other citizens. organisational structures, information cascades and a strong civil society are needed to form successful protest activities, since they link citizens’ dissatisfaction with political action. Furthermore, being a member of an organisation goes hand in hand with sharing certain values and perceptions of society: Information- and transaction costs are decreased by organisational structures.\textsuperscript{100}

From the view of state power, we can think of possible reactions of polities which could constrain people’s opportunities, like repression or surveillance by security forces, if people choose actions which are not legal in a given polity or a possible danger to the political elite. Many scholars reflecting on opportunity structures deal with the potential of regimes to repress people’s actions. Political repression “consists of government action which grossly discriminates against persons or organisations viewed as presenting a fundamental challenge to existing power relationships of key government policies, because of their perceived political beliefs”.\textsuperscript{101} Like stated in the citation of Qadhafi before this section: Many authoritarian Leaders use repression to generate integrity within their political system by any means necessary. Since repression portrays the most obvious case of constraining people’s opportunity structures, to what extent does repression alter people’s actions? Like illustrated in figure 4, Eisinger (1973) assumed a curvilinear relationship between the repressiveness of a given political system and protests: While an extremely repressive system is said to offer little or no opportunities for rebels to establish anti-government actions, an extremely open political system offers no reason for them.\textsuperscript{102} This is due to the fact that people in the latter case have the opportunity to influence state decisions via legal and therefore less costly political actions such as elections. Furthermore, individuals living in highly repressive systems are less likely to take their demands to the streets because costs of such actions outweigh their benefits: It is very likely that protests in repressive regimes will face counteractions by the regime, since protestors’ claims are likely to be unacceptable for the members of the ruling polity. Therefore,

\textsuperscript{99} Klandermans (1984: 584-586).
\textsuperscript{100} Jenkins (1983: 527).
\textsuperscript{101} Goldstein (1978: xxviii).
\textsuperscript{102} Eisinger (1973: 15).
resource mobilization scholars agree that protests are most likely in mediocre repressive political systems as indicated in figure 4 highlighted in grey. This inverted-u form relationship between repression and protest is an almost unchallenged “law” of political science. Most resource mobilization scholars reflect on numerous factors which constrain people’s cost-benefit calculations. But are we convinced that protests mainly depend on opportunity structures? Or do we rather believe that humans’ frustration brings them to action in order to get rid of it?

My concept combines both ideas by arguing that frustration and opportunities matter: Firstly individuals must feel a certain discrepancy between their value expectations and their value capabilities. Secondly people take cost-benefits thoughts into consideration by thinking how to get rid of ones’ frustrations. And this last argument slightly differs from the resource mobilization argument. However, taking a look into opportunity structures in the Arab states, repression is particularly striking and challenging any opportunity thesis: Why should any Arab take his or her demands to the streets facing the most repressive polities at the time being? The actions we have seen during the Arab Spring seem to challenge the idea of contention theory that anti-government actions seem to be most

---

103 For a deeper look into this argument, please see amongst others: Eisinger (1973: 15); Meyer (2004: 128); Muller (1985: 48); Muller and Weede (1994: 43-44); Snyder and Tilly (1972: 526).

104 For instance McAdam (1982) in his analysis of the social rights movement in the United States considers favorable changes in policy – like the fall of the cotton economy in the Southern states of the US. Or Kriesi et al. (1995), who introduce political cleavages, institutional structures or alliance structures in their cross European analysis.
likely in mediocre repressive regimes: Demonstrations in the Arab world – especially in highly repressive regimes like Syria or Algeria – have taken place in unfruitful opportunity settings. This empirical fact might bring us back to believing that rebels are irrational actors, but as I argue, Arabs’ actions are still rational.

Let us take one step back: So far I have drawn on relative deprivation and especially on political deprivation. I argued that critical democratic citizens might find themselves in trouble living under authoritarian regimes and feel relatively politically deprived. Taking one step forward, a critical democratic citizen who feels relatively deprived has to think about how to get rid of his or her frustration. So here we are thinking about opportunity structures. Politically deprived people are framed by their value expectations and might act in light of their beliefs.¹⁰⁵ Now let us reconsider citizens’ opportunities to alter the status quo available in an authoritarian or hybrid regime. First of all people might look at possible legal opportunities, since these opportunities are not costly, compared to illegal actions which might be accompanied by harsh punishment. However, legal mechanisms to influence decision-making in authoritarian regimes are not only scarce, but also most likely facades: Most scholars agree that the purpose of establishing elections in authoritarian regimes relates to the higher survival chance of the autocrat.¹⁰⁶ Therefore elections function as a selection process in which voters can only cast their votes for either a representative body with no political powers or for candidates who are pre-selected by the regime. Lust-Okar (2006) as well as on Jordan and Blaydes (2006) in her study on Egypt conclude that such selection processes alter the expectations and reasons on which voters cast their votes: Voters no longer expect political change or reform, but pork-barreling.¹⁰⁷ As a matter of fact, legal mechanisms under authoritarian rule are not effective in cutting back political frustration. They might even foster ones’ political deprivation.

So let us assume that being relatively politically deprived over a certain time and recognizing that conventional mechanisms within our political environment are not fulfilling your expectations. If conventional mechanisms do not provide the necessary mechanisms to get rid of your frustration, maybe unconventional actions might do so. In other words, a rational actor might learn that certain mechanisms are not presenting the expected results and hereupon think about different actions. This implies that individual’s goals stay constant, while their beliefs about the effectiveness of means might change: People might have different prior beliefs about the effectiveness of certain actions, which will be updated by new information they receive about the outcome of these actions.¹⁰⁸

¹⁰⁶There a diverse explanations why the facade of voting increases the chance for authoritarian leaders to stay in office: Leaders might gain information about the mobilization capability of the opposition, see for instance: Cox (2009: 6-15) or Geddes (2006: 17-22); Leaders give in to international pressure, see amongst others: Blaydes (2006: 9-10).
¹⁰⁸Gilardi (2010: 651-653)
5 illustrates – on the basis of three actors (A;B;C) – this so called bayesian learning concept. A priori actor A is quite sure that anti-government actions will not be successful in reforming the polity, while actor B evaluates anti-government actions as successful and actor C is unsure about the outcome of anti-government actions. When new data about the successfulness of anti-government actions is received, all three actors change their posterior beliefs: All three actors achieve identical information on the successfulness of anti-government actions. However, based on their prior beliefs, posterior beliefs still do not reflect the received information, but are framed by actors’ posterior beliefs. As a result, actors B and C seem to be rather sure that anti-government actions will produce the expected positive effect. In contrast actor A is still not convinced of the given information and basically sticks to his a priori assumption, that anti-government actions will not provide a positive effect.\footnote{Gilardi (2010: 651-652)} Translated to my framework, relatively politically deprived persons might learn that conventional participation – for instance elections – do not influence political reforms. With every single ineffective or fraud election, politically deprived persons can be more assured that elections will never result in political reforms. Therefore they might stop electing and start to protest. As a result of the learning effect they might rethink the costs and benefits of anti-government actions in order to make sure they can get rid of their frustration. Basically this argument postulates the direct opposite of the power contention thesis: The less opportunities to influence political decision-making an individual perceives over a certain time frame, the more likely anti-government actions

\footnote{Gilardi (2010: 651-652)}
While this learning argument is new to research on repression of anti-government actions, preliminary research partially pointed to rethink the curvilinear relationship between repression and protest. Khawaja (1993) for instance shows, that repression in the past might spur protest activity in the future.\textsuperscript{110} He harshly criticises past research on repression for not overlooking developments in repression across time:

“Most previous quantitative analyses of collective action have been based on static models, using cross-sectional data (e.g., Gurr, 1968b; Hibbs, 1973; Feierabend and Feierabend, 1972; Paige, 1975; McAdam, 1982, 1983). [. . .] Yet collective action is a dynamic process; it may occur at any time. Analyses of this process by traditional regression procedures based on aggregated data yield biased estimates and erroneous inferences (see Blossfeld et al, 1989:22-25; Tuma and Hannan, 1984).”\textsuperscript{111}

Therefore it is plausible that people also learn about repression and learn about anti-government actions across time: Repression is not a static object, which does not develop across time. Some scholars even argue that repression and anti-government action oscillate, are partly depending on one another.\textsuperscript{112} This is certainly an interesting assumption, yet beyond the scope of my thesis. Thus the oppression that might suppress protest yesterday spurs it tomorrow.\textsuperscript{113}

\textsuperscript{110}Khawaja (1993: 57-64).
\textsuperscript{111}Khawaja (1993: 57).
\textsuperscript{112}Tsebelis and Sprague (1989).
\textsuperscript{113}Mason and Krane (1989).
3 Looking into the Arab States: Deprivation and Repression in Comparative Perspective

“We have already given them democracy, but now, they want participation.”

Member of the Bahrain Royal Family

The following chapter gives a short overview of the political and economic situation in Egypt and Morocco and links the empirical situation with the theoretical arguments illustrated in the last chapter. The design of this chapter follows the same structure as the theoretical section. Firstly, I draw on my relative deprivation argument outlined in the last section. Secondly, I deliberate on the impact of repression on anti-government actions. Thirdly, the developed hypotheses are followed by thoughts on the potential differences between relative and absolute deprivation. Since I put a lot of effort in explaining rival theories to relative deprivation arguments, this section tries to illustrate why absolute deprivation arguments might be less fruitful for the purpose of this study than relative deprivation arguments.

Regrettably the successive analyses deal with two different case selections. Therefore the postulated hypotheses on relative deprivation focus on differences between the Kingdom of Morocco and the Arab Republic of Egypt, while the learning hypothesis on repression supplementarily deals with Tunisia, Libya, Mauritania and Algeria. This variation in cases is due to availability of data of countries in the MENA region and will be explained in the operationalization chapter.

3.1 Morocco and Egypt in Comparative Perspective

Before developing my hypotheses, we should take a deeper look into the case selection: Why should we take a look into the MENA region? Why should we compare Morocco and Egypt?

First of all, the MENA region is special in its duration, variance and robustness of authoritarian political systems. Stretching from the Mediterranean to the Asian conti-
nent not one country, out of the 22 member states of the Arab League can be described as a stable democracy. Furthermore, only two countries in the MENA region – Israel and Turkey – meet the standards to be classified as electoral democracies, significantly both countries are not members of the Arab League.\(^{114}\) While Latin America and Asia underwent drastic changes during the second and third waves of democratization, authoritarian regimes in the MENA region do not only seem to have stabilised their reign, but also to have strengthened the latter. Scholars largely focused on understanding why the Arab states refused the waves of democratization and not how these regimes might be challenged one day by their subordinates. This changed with the start of the Arab Spring in 2010. Scholars mainly focused on five arguments for the exception of the Arab states during the last waves of democratization: First of all, civil society is weak.\(^{115}\) Since civil society is said to be important for democratization processes, a weak civil society hinders democratization: Labor unions, businessmen associations and non governmental organisations (NGOs) hold state powers accountable to popular demands.\(^{116}\) Without these organisational structures, citizens’ demands are not effectively articulated to their governments. Secondly, Arab governments, monarchs and dictators largely remain in control of economic mechanisms and oversee large state firms. Overall Arab states rejected privatisation and therefore are often the largest employer for their citizens.\(^{117}\) Thirdly, poverty, low education and inequality spreads around the region. Scholars largely connote that education and economic well-being are important for democratization.\(^{118}\) Followed by rentier state structures, elites are frightened by democracy, since this could result in a loss off economic control. Fourthly, specifically cultural factors – Islamic traditions – are preconditioned to be incompatible with democracy. And lastly, large scale social movements or demonstrations were missing in the region. After hearing all these arguments, the reason why this thesis analyses protest activity in Northern Africa is obvious: Prior to the Arab Spring this region was outstanding in its robustness of authoritarian regimes. Yet, protest activities occurred in those regimes and as a result seemed to challenge knowledge and assumptions of pure rational choice models: Why should Arabs rebel if costs of protest seemed to outweigh its benefits?

Yet, some scholars noticed a change during the 1990s and 2000s in Arabs’ protest activity: “[...] the forms and means of political participation increased in Morocco and Egypt.”\(^{119}\) As figure 6 illustrates Egypt and Morocco have faced major anti-government actions since 1990. However until 2004 both countries never had experienced – except for Egypt in 1995 – more than ten anti-government actions per year counted in the Social

\(^{114}\)Bellin (2004: 139 & 153).
\(^{115}\)Norton (1995).
\(^{117}\)See for instance: Omran (2007); Belev (2001).
\(^{118}\)However this argument is discussed controversial in academic literature, see: Diamond (2009: 94).
\(^{119}\)Vogel (2011: 27).
Conflict in Africa Database (SCAD). This indicates that Egyptians and Moroccans largely have been and are still unsatisfied with their rulers’ work, otherwise they probably would not demonstrate against it. Notwithstanding, this first descriptive illustration shows that anti-government actions in the MENA region existed and increased in numbers since 2000. This observation also finds huge support in qualitative studies about protest activity in the region. At least since 2000 they seem to be of significant importance for the political situation in Egypt and Morocco. In contrast, the remaining countries in Northern Africa have largely stayed calm. Protest activities in both countries focused on policy changes, but not on overthrowing political systems: In Morocco the National Plan for the integration of women in development fired a civil debate about the Islamic law and women’s rights. Rivals of this plan took their demands to the streets in large protests in Casablanca and Rabat. Furthermore, after Prince Mohamed VI had inherited the throne of his father King Hassan II, discussions and protest about Hassan’s politics of repression during the “years of lead” broke out. On January 6, 2006 King Mohamed

Source: Author’s own; SCAD database.

120 For further details, please see: http://strausscenter.org/scad.html. The operationalization section contains a specified overview of the database.

121 Ottaway and Hamzawy (2011); Brumberg (2002).

122 A comparable picture is drawn in the remaining Arab states in NA as can be seen in the appendix figure 12.


124 The Years of Lead describes a period of King Hassan II rule (1960-1980) marked by large scaled state repression against dissidents and democracy activists.
even expressed his regrets for the abuses of human rights during his father’s reign.\textsuperscript{125} In Egypt, social movements and protests largely confronted the plan in place to make Gamal Mubarak his father’s successor, and furthermore Hosni Mubarak’s authoritarian rule in general. In 2004 the Kifaya movement – meaning “Enough!” – attracted international observers’ attention. The movement played an important role pushing for political reform during the elections in 2005.\textsuperscript{126} And was successful to some extent:

Besides increasing protest activity in both states, Morocco and Egypt are two heavy-weights in the MENA region. Both countries share comparable international openness and enjoy links to the European Union (EU) and United States of America (USA). After Mohamed VI had inherited the throne, after “pluralist” presidential elections had taken place in 2005 and some signals of growing freedom of the press, observers saw Morocco on the track of democratization. Yet, observers might have interpreted these signals wrong: Since the Arab Spring, scholars reflect on these signals as a strategy to outfox the opposition in Morocco. As in the days of Hasan II, protesters have been arrested and three killed.\textsuperscript{127} The promised democratic reforms seem to underpin this argument: The demands of objectors have been answered by small reforms and earlier elections of the parliament. These reforms might have long term influences, but in short term they underpin the reign of the royal palace.\textsuperscript{128} In the last decade, Egyptians have been protesting against almost everything: The war in Iraq, Mubarak’s reluctant position to the Conflict between Israel and the Palestinian authorities, shortages of water and gas and the results of the presidential elections in 2005.\textsuperscript{129}

While Egypt and Morocco are in some degree comparable in their protest activity, they largely differ in their polity: Egypt is a presidential regime, while Morocco is a constitutional monarchy. The following most different systems design of the relative deprivation argument tries to illustrate why we should clearly differentiate between the authoritarian settings in the MENA region and elsewhere: Just as democracy is not the same in every country, autocracies harshly differ in power structures, its source of legitimacy and last but not least in citizens’ perception of their political situation. While this section illustrated common quality and quantity of protest activity – the dependent variable of my thesis –, the following section tries to illustrate major differences between both countries – the independent variables of my thesis. However, these first descriptive thoughts underpin the citation at the beginning of this section: Having Democratic institutions does not come along with having a democracy.

\textsuperscript{125} Hazan (2006: 10).
\textsuperscript{127} Benchemsi (2012: 58).
\textsuperscript{128} Dalmasso (2012: 217).
\textsuperscript{129} Ali (2012).
3.2 Relative Deprivation in Morocco and Egypt

But how could we explain that collective actions with the target to push the governments for reform not only took place, but also increased in the last decade? Why did scholars largely underestimate Arabs’ protest activity? In the 1990s scholars were confident about the Arab states finally liberalizing their autocratic system. Nevertheless none of the Arab states ever fulfilled that hope.\textsuperscript{130} Most of the Arab autocracies stagnated in their movement to liberalisation, they largely became so called hybrid regimes: Regimes with democratic institutions but autocratic leaders. Some of them even backdropped – like Algeria after free elections had been held – to closed autocracies.\textsuperscript{131} They temper pluralism with authoritarianism by tolerating a certain degree of political openness – like elections – but with autocratic regimes still being in charge of politics.\textsuperscript{132} Nevertheless, gradually implementing democratic institutions in authoritarian settings might still have influenced people’s value expectations to gradually become a part of political decision-making within their polities. If their expectations largely deviate from the state structure they are living in, they might not be satisfied with a stagnating reform process. This argument also finds support in the preliminary literature on the Arab Spring. For instance Ali (2012) observes:

“[…] there had been sustained protests for at least a decade before the January 25th uprisings, which functioned as the political incubators that nurtured the forces of the revolution, shaping people’s political consciousness and organisational capacities.”\textsuperscript{133}

Ali’s observation implicitly supports my underlying theoretical argument: Arabs have been frustrated for at least one decade and have learned from their past activities how to effectively bring their demands to the Arab streets, instead of hoping for gradually change through elections.

As explained in the theoretical section of my thesis, we have good reasons to believe that the target of frustration of relative political deprivation is more likely to be localized by a collectivity than relative economic or social deprivation. I argued that the collective sharing of a certain target for the underlying frustration of relative deprivation is more likely if we face political grievances, since all citizens in one state are living under the same political system, while the effects of economic or social situations might differ harshly across individuals. Consequently, this assumption should also hold true for the underlying case selection. As outlined in figure 6, King Mohamed VI and his forerunner King Hasan II in Morocco both faced less anti-government actions than President Hosni Mubarak did.

\textsuperscript{130}King (2009: 3-17).
\textsuperscript{131}Brumberg (2002: 56-58).
\textsuperscript{132}Brumberg (2003: 3).
\textsuperscript{133}Ali (2012: 16).
in Egypt. Hence, the impact of relative political deprivation is anticipated to vary across countries. Observers examining the events starting in 2010 within the MENA region often stress the idea that variations in uprisings are closely linked to the type of regime in a given state.¹³⁴ Scholars especially note that: “The potential for reform from the top is high in all Arab monarchies.”¹³⁵ In contrast to other authoritarian rulers in the MENA region, monarchs still enjoy legitimacy by their citizens.¹³⁶ Many scholars point to the traditional islamic rule – monarchs in the Middle East usually point to their direct ancestry from Mohamed of Mecca – as the mechanism behind enjoying legitimacy.¹³⁷ However locating legitimisation only in traditional or religious aspects does not suffice for explanation: Firstly, just as the remaining regimes in the Middle East, Arab monarchies are comparably young polities with the Saudi Arabian monarchy being the oldest established in 1932. Thus, the tradition of monarchy rather appears to be a new aspect of the islamic tradition, especially when we take into consideration how long monarchies have existed in Europe. Secondly, even if we accept tradition as an explaining determinant of the survival of monarchies, traditions are also not immune to modernization. In other words: Tradition cannot explain Arab monarchs’ capability of staying in charge in an ever changing and modernizing world.¹³⁸

There are two other reasons why Arab monarchies might be less challenged by anti-government actions compared to their non-monarchic neighbors: Arab monarchs are capable of using hitherto established political institutions – like the parliament – as a scapegoat. The leading example for this argument is King Abdullah II of the Hashemite kingdom of Jordan: Abdullah II never gets tired of localizing reform stagnation in parliament or the government and as a consequence of dismissing both.¹³⁹ Basically Jordanians’ anger discharges on the former Prime Minister Samir al-Rifa’i’s government and especially the elected parliament.¹⁴⁰ The monarchs established credible power commitments on paper by implementing democratic institutions within authoritarian settings: While still being in the political driver’s seat, monarchs are not recognized as politicians but as a power standing beside politics. Moreover monarchies use parliaments not to address political, but rather social and economical issues: At the end monarchs can point at the government or the parliament if the state lacks social or economic reforms.¹⁴¹ Joffé (2009) in his analysis of political reforms in Morocco concludes that “political reform was a strategy to ensure dynastic survival which sought to re-create the principles on which the pre-colonial

¹³⁴Salem (2010); Asseburg (2011: 23-52); Brand (2011); Carey and Reynolds (2011); Plattner (2011).
¹³⁵Ottaway and Muasher (2011: 21).
¹³⁶Ottaway and Muasher (2011: 21).
¹³⁸Anderson (1991: 3).
¹³⁹Pelham (2011); Yom (2011).
¹⁴¹Maghraoui (2002: 30).
Following Ottaway’s argument Arab monarchs are still striving for political reform or at least are capable of pretending to do so. In contrast, Mubarak and his National Democratic Party – founded by Anwar El Sadat in 1978 – together established a de facto single-party authoritarian system. Yet, after the assassination of Sadat in 1981, the Mubarak regime loosened the choke-hold of state power: He released about 1300 political prisoners, the press was given more leeway and in 1984 the Muslim Brotherhood was allowed to take part in the elections. Yet, the three parliamentary elections during the 1990s are considered less democratic, vote fraud took place at a larger degree and the repression of political opposition parties enlarged. During in the late 1980s and early 1990s the political system in Egypt experienced a gradual opening, Mubarak’s regime incrementally limited the dispersion of power by strengthening Mubarak’s position before and after the millennium: Mubarak gained the possibility to put his opponents into military trials, to jail human rights activists or to further censor media. This excessively distinguishes the presidential system of Egypt from the monarchical system of Morocco. The former mentioned “scapegoating tactic” never could have worked for Mubarak, since criticizing the parliament – with the majority of seats occupied by his party – would mean to criticise himself. Consequently critical citizens in Egypt were able to locate the source of their possible frustration collectively in Mubarak, while their counterparts in Morocco might differ in imputing the source of their frustration. The target of Egyptians’ actions seems to be clearer, than the one of Moroccans actions. Therefore the impact between the discrepancy of value expectations and capabilities of critical Egyptians should appear to be larger than in the Moroccan case. As a result I expect critical citizens in Egypt to be more relatively politically deprived than their counterparts in Morocco, since Egyptians might clearly link their – at that time called – “pharaoh” Mubarak with the perceived political situation. As has been explained of late Moroccans and Egyptians could be politically deprived, because after first steps towards democratization have taken place in their polities, they could have expected further steps towards democracy from their leaders. They could be politically deprived because their value expectations increased while their value capabilities stagnated – or even decreased in some cases. This deprivation could follow the logic of a progressive relative deprivation pattern:

\[ H_1: \text{Relative political deprivation has a larger impact on joining anti-government actions in Egypt than in Morocco.} \]

---

142 Joffé (2009: 151). This result also finds support in newer quantitative studies: Menaldo (2012).
Put simply: A Moroccan democracy supporter might feel less frustrated as an Egyptian democracy supporter, since the Moroccan political system appears to be less authoritarian than the Egyptian one.

Besides political deprivation the theoretical argument suggests that under certain circumstances – namely large scale control of the economy by rulers – economic deprivation might also play a major role as a motivation to support anti-government actions. Having said that, most scholars using deprivation arguments largely referred to economic deprivation as most important factor for people’s frustration, the theoretical argument of this thesis rejects this idea: Economic conditions might be an additional factor for people’s grievances, but not the crucial one. Figure 7 displays the Gross Domestic Product (GDP) per capita development in US-Dollars as of 2011 in Egypt and Morocco since 1990. According to the GDP per capita development neither Egyptians nor Moroccans experienced major economic backdrops. Since the micro data analysis is built on data from 2000 and 2001, people should not have major economic grievances according to the so far illustrated data. Moreover unemployment in Morocco even decreased from almost 23% in 1995 to 9% in 2011, while unemployment in Egypt nearly stagnated around 9%.\footnote{147} So far I discussed absolute economic conditions in Egypt and Morocco and postulated assumptions regarding people’s possible economic grievances. Furthermore the theoretical argument rather discussed rulers’ potential control over the economy within their states. However,\footnote{147}Figure 13 in the appendix illustrates the trend in unemployment in Egypt and Morocco.

Source: Author’s own, based on Worldbank Data (World Development Indicators).
these arguments largely reflect on the idea that people compared their economic conditions with their own at an earlier point in time. However, due to the new informational cascades – especially the internet – Moroccans and Egyptians might compare their economic capabilities to Western democracies. In so doing, Moroccans might perceive a larger gap, since unemployment and poverty are both higher in Morocco than in Egypt. As a result, if we discuss people’s economic value capabilities it seems rather important to know the reference of their comparisons. Unfortunately analysing those references is beyond the scope of my thesis – since this brings in a second dependent variable – and impossible due to the underlying data. The indicators discussed so far and sources of comparison leave us with a mixed view of Egyptians and Moroccans economic value capabilities. Therefore, before deducing a hypothesis, let us consider rulers’ control over, and potential benefit of, their economies as the theoretical section pointed out these circumstances might matter for the target of protest activities. So how are economies in Morocco and Egypt shaped?

Scholars agree that Arab governments largely dominate private sectors “to a degree unmatched in other emerging regions.”¹⁴⁸ Moreover privatisation has been on a low level in the MENA region, major companies are still under state control.¹⁴⁹ However, Morocco and Egypt are both forerunners in privatising: they account for 60 percent of all privatisation incomes in the MENA between 2000-2008.¹⁵⁰ At first glance privatisation goes hand in hand with redistributing assets of the state to market mechanisms. Taking a second look, privatisation in the case of Morocco meant providing pork to political supporters of the palace.¹⁵¹ Yet, since 2001 half of any privatisation revenue is channeled into the “King Hassan II Fund”. In 2009 this fund had collected more than 4 billion US-Dollars and financed public investments with about 27 billion US-Dollars.¹⁵² In summary, privatisation in Morocco seems to be driven by satisfying the so called “Fassi” elite – which refers to the traditional elites of the country, primarily located in the city of Fes –, which in return pledges loyalty to the royal house.¹⁵³ During the first wave of privatisations, this exchange of money for loyalty was more obvious to Moroccans, in the second period of privatisation starting with the millennium, the royal house tried to coat these activities by using revenues of privatisations partly to increase public spending in order to reduce poverty.¹⁵⁴ Overall, the economic power position of the palace has not been weakened or changed.¹⁵⁵ In Egypt, privatisation has also been used to secure the support of important elites: “While the newer capitalists close to the regimes were beneficiaries, the dramatic opening angered many of the business elite who still had vested interests in a semblance

of a national market.” Mubarak’s efforts to modernize the economic system of Egypt was aimed at political and economic rent seeking: While the Egyptian regime partly managed to secure control over the economy throughout the privatisation processes until the millennium, after 2004 – after another privatisation wave – their control over it began to vanish. In contrast to Morocco, Egypt underwent major periods of nationalisation: Until the 1980s, Egyptian politics supported socialist ideas and therefore the Egyptian state has been the largest employer in Egypt. Even in 2002 – after almost 20 years of liberalisation – the Egyptian state was still the major employer in Egypt. Therefore, there seems to be a difference in degree of the control over the economy between Egypt and Morocco.

In summary, economic indicators and the history of rentier-state structures in both countries leave us with a mixed view. Nevertheless, if Moroccans compare their economic capabilities to foreign countries, they might perceive a larger discrepancy between their value expectations and capabilities than Egyptians. Moreover, while the Mubarak regime partly gave up control over the Egyptian economy and contributed to the growth of the private sector, King Mohamed VI focused on satisfying important elites in order to assure his reign. Since the analysis overviews the situation around the millennium, there is good reason to believe that Moroccans perceived a larger economic deprivation than Egyptians.

\[ H_2: \text{Relative economic deprivation has a larger impact on joining of anti-government actions in Morocco than in Egypt.} \]

Nevertheless, the overall theoretical assumption that economic deprivation is less important for people’s precondition to support anti-government actions should hold true. As outlined in hypothesis one, I expect political deprivation to have substantial impact on people’s precondition for supporting anti-government actions, while economic grievances are expected to impose a parenthetical effect.

As described in the theoretical section, scholars like Tilly and Snyder criticised the overestimation of relative deprivation arguments and the underestimation of opportunity structures – like organisations – in their explanation of protesters’ motivations. To adjust to this argument my theoretical assumptions include opportunity structures: They might constrain grievances and as a result people who are politically deprived and perceive certain opportunities might be more likely to join protest activities. As already mentioned at the beginning of this section, organisational structures are scarce throughout the MENA region and neither Egypt nor Morocco pose exceptions. As a result, the analysis might show that opportunity structures might not be as important as some scholars have noted. As described so far, it seems that Arabs protest largely started with people’s grievances and organisational structures formed after protests had already risen.

---

156 Dahi (2012: 51).
3.3 Regime Repressiveness and Absolute Deprivation in Authoritarian Regimes

Beyond people’s grievances, their opportunities to protest might also matter: As the theoretical section stated, power contention theory postulates that anti-government actions are most likely in mediocre repressive regimes, since both high and low repressiveness correlate with higher costs for anti-government actions. While in highly repressive regimes costs rise due to sanctions by the state power, in regimes with little repression the cost-benefit calculation for legitimate political actions — like elections — indicate high costs related to protests, since taking demands to the streets seems more costly than marking your favorite candidate on election day. Therefore Eisinger amongst others concluded that repression and protests are linked in an inverted u-curve. Hence, my theoretical argument underpinned a diametral argument: Democrats might learn that the only possibility to alter policies in authoritarian polities is to take reform demands to the streets, since any other action provided within autocracies will not affect rulers’ policy decisions. I called this the learning assumption. My approach differs concerning the focus of analysis: Overviewing repression across time might change our understanding of repression. Based on this theoretical assumption there should be a u-curve relationship between repression and protest activity: If we analyse repression across time, protest activity might be most likely in highly repressive regimes or regimes with low repression, while mediocre repressive regimes are not facing major times of discontent.

While the last section illustrated my hypotheses for the micro model, the following section exemplifies my hypothesis for the macro model, which includes beyond Morocco and Egypt also Mauritania, Algeria, Tunisia and Libya. The former section illustrated which differences concerning protesters’ grievances might exist between Moroccans and Egyptians. In contrast this section reflects on generalizable hypotheses across all countries mentioned.

As illustrated in figure 8 Algeria, Egypt, Morocco, Libya, Mauritania and Tunisia moved within limited amounts of repression and large civil and political rights violation between 1989-2010. Throughout the whole period of observation Arab states have never been given the rank of secure law, while having been ranked 79 times as undergoing “extensive political imprisonment, or a recent history of such imprisonment. Execution or other political murders and brutality may be common. Unlimited detention, with or without a trial, for political views is accepted.” Besides ongoing repression, anti-

---

159 The Amnesty Repression Index developed by the Political Terror Scale ranges from 1 (Countries under a secure rule of law)-5(whole population affected by repression). (Please see political terror scale coding, at: [http://politicalterrorscale.org/ptsdata.php](http://politicalterrorscale.org/ptsdata.php)) The illustrated data points of the index in figure 8 are lagged by one year, therefore the data point in 1990 is the overall mean of the six Arab states repression index in 1989. As a result the illustrated data of the repression index runs from 1989-2010, while anti-government actions are illustrated from 1990-2011.

government actions have been on an inconsistent rise since 2000 with a culmination point of 25 on average in 2011. Figure 8 also underpins the assumption that anti-government actions and repression are linked in a linear manner: After 2000 the lagged repression index rises and anti-government actions, too. From 2000-2005 there is an almost parallel development of the two. Overall there seems to be a large difference between the amount of anti-government actions before and after the millennium.

\[ H_3: \text{There is a } U\text{-curve relationship between regime repressiveness and anti-government actions: Regimes with low and high repression face more anti-government actions than mediocre repressive regimes.} \]

As indicated in figure 7 Egyptians underwent a small shortage in their incomes from 2001 to 2004, but from thereon a major increase in incomes took place. The run of the curve in figure 7 corresponds to the run of Davies’ j-curve in figure 1. Figure 9 shows the GDP per capita development in the six countries included in the following analysis. After the world economic crisis in 2008 the six Arab states experienced a decline in GDP per capita, which found a short increase in 2010, but once again decreased as a result of the uprisings in 2011. If we trust Davies’ j-curve effect there are reasons to expect an impact on the macro data analysis – which contains all available data from 1990-2011 – because the worldwide financial crisis also impacted the economic situation in the MENA region as indicated in figure 9. In contrast to Davies’ argument, my theoretical assumptions
often pointed to differences between absolute and relative deprivation. Due to that, I expect that people’s absolute economic deprivation – meaning their economic deprivation measured with indicators on state level – does not have a significant impact on people’s potential to rebel.

A comparable argument can be made for political deprivation: Algeria, Morocco, Tunisia and Egypt all experienced periods of partial liberalisation of political rights.\textsuperscript{161} In Algeria this period was followed by harsh cuts on political rights. During the 1980s Algeria underwent popular unrests, followed by a regime change and elections in 1990. Foreseeing a potential election win of islamists, a military takeover stopped the democratization wave in Algeria.\textsuperscript{162} However, Tunisia seems exceptional: Ben Ali’s ruling strategy hardly changed during the last two decades. Tunisians never experienced major periods of liberalisation. Ben Ali never risked any form of liberalisation, not even a small controlled one, as in the neighboring countries.\textsuperscript{163} Yet, elections in Tunisia were held fairly competitive, even if the chief of executive himself was never elected by competitive elections. Yet, by the time Ben Ali replaced Bourguiba by a bloodless coup d’état, the former promised political liberalisation. Unfortunately – even for himself – he never held up to his promises.\textsuperscript{164} Libya has been rarely addressed by scholars focusing on democratization, 

\textsuperscript{161}Brumberg (2002: 59).
\textsuperscript{162}Ottaway and Hamzawy (2011: 4-5).
\textsuperscript{163}Brumberg (2002: 60).
\textsuperscript{164}Sadiki (2002).
and if so they hoped for a better future after Qadhafi left his office.\footnote{Barger (1999).} This is underlined by the data of my thesis: Libya is the only country classified as a full autocracy throughout the whole period of observation. As indicated in figure 10, Libya faced the fewest anti-government actions throughout the whole period of observation. In conclusion I propose that political systems, whose head of executive promised political liberalisation or a certain degree of liberalisation seem to be more likely to be target of anti-government actions. This argument relates to the theoretical assumption of progressive political deprivation: Citizens having experienced any degree of political liberalisation hold rising expectations. However, if political leaders do not live up to their promises, they disappoint their citizens. As a result people get frustrated because they experience a growing discrepancy between their political value expectations and their capabilities: They rebel.
4 Operationalization: Cases, Data & Measurements

This section illustrates the data in my study, its shortcomings and the case selection for my quantitative research section. I use macro (state structure) and micro data (individual polling) to investigate my presented theses. Firstly, I explain my case selection before presenting the macro and micro data. As discussed scholars largely underestimated the possible existence of a huge difference between absolute and relative deprivation. This thesis tries to partly solve this puzzle by analysing micro and macro data and pointing to possible differences between the models. While the macro data analysis can be seen as a synonym for absolute deprivation, the micro data analysis functions as a synonym for relative deprivation. Obviously – like any other quantitative model – my analysis has certain shortcomings. Overall these are related to the problem that some data is not available on the individual level, but on the state level and vice versa. Nevertheless the idea was not to establish two frameworks which use the same indicators on the micro and macro level, but two models from which we can draw some clarification regarding what matters for anti-government actions. Under which circumstances is relative deprivation of importance? And does absolute deprivation matter in any situation? The results might give hints for further research and clarify whether we should rethink our judgement on relative deprivation arguments.

4.1 Case Selection

Since I discuss the situation in Arab countries my case selection is already restricted to Arab states. As my work is not broaching the issue of the term “Arab” and its actual meanings, I am going to use a simple definition of an Arab state: My case selection is restricted to all countries which so far have joined the Arab League. The reason for choosing the Arab League as an identification indicator is striking: Being a member of the Arab League offensively articulates willingness of member states to be seen as an Arab state. As the Pact of the League of Arab States says: “The League of Arab States shall be composed of the independent Arab States that have signed this Pact.” Since the Arab League consists of 22 members, my research overlooks possible protests in 22 countries. Nevertheless, at least four of the member states cannot be considered being an independent, stable polity: Iraq, Somalia, Sudan and the Palestinian Territories. Iraq is still suffering – and is still highly influenced by the USA – from the second Gulf-war.

\footnote{Pact of the League of Arab States (1945).}
Somalia mostly appears as the state of civil war and pirates overlooked by the international naval mission in the Gulf of Aden, while the Sudan no longer exists. Nowadays there are North- and South-Sudan battling for spouters.\textsuperscript{167} As the name “Palestinian territories” already suggests: So far the United Nations (UN) do not even recognise these territories as a state.\textsuperscript{168} Obviously these four “states” are confronted with different problems in contrast to the rest of the Arab League. Beyond that, state data measurements seem discussable in “non-states”.\textsuperscript{169}

Furthermore, reliable data on anti-government actions is scarce, especially in authoritarian contexts. The SCAD data of the Strauss Center contains data of “protests, strikes, riots, inter-communal conflict, government violence against civilians, and other forms of social conflict not systematically tracked in other conflict datasets.”\textsuperscript{170} It currently includes informations on more than 7,900 social conflicts from 1990 to 2011 and informations about aims of the uprisings. The project works under the supervision of Cullen Hendrix and Idean Salehyan. While the SCAD team works on the impact of climate change, the SCAD data contains a range of information on protest structures which can be used for my purpose.\textsuperscript{171} Unfortunately this database is restricted to the African continent and

\begin{figure}[h]
\centering
\includegraphics[width=\textwidth]{case_selection.png}
\caption{Case Selection}
\end{figure}

\textit{Source:} Author’s own, created with stepmap.

\textsuperscript{167}Shortland and Vothknecht (2011); Al Jazeera (2012).
\textsuperscript{168}United Nations (2011).
\textsuperscript{169}Looking into the state fragility data underpinned my decision: In 2010 Somalia and Sudan are both rated extremely fragile and are ranked as the most fragile states in the world. While Iraq is rated as highly fragile (Marshall and Cole 2010).
\textsuperscript{170}The database has recently been published at on June 28\textsuperscript{th}, 2012. So far there is no academic work available using the SCAD database, please see: Salehyan et al. (2012); Or: \url{http://strausscenter.org/scad.html}.
\textsuperscript{171}Nevertheless, I had to reconstruct the data into a panel structure, since the published data was not useable for my purpose.
therefore does not overlook all Arab states.

As a consequence my macro data analysis deals with the six Northern African Arab states: Mauritania, Morocco, Algeria, Tunisia, Libya and Egypt. As figure 11 indicates this still means that data on all Northern African Arab states is included in the macro analysis and thus corresponds to approximately 171 million people in 2011. To estimate the impact of relative deprivation I use the World Values Survey (WVS), which consists of a global network of social scientists studying changing values and their impact on social and political life.\textsuperscript{172} President of the organisation is Ronald Inglehart of the University of Michigan, Ann Arbor. Unfortunately the third wave of WVS does not include all six Northern African Arab states, but only: Egypt and Morocco.\textsuperscript{173} Consequently, these two shape the overlap between both analyses and the following section gives a short overview on why I am comparing these two Arab countries.

\section*{4.2 The Micro Model: Measuring Relative Deprivation}

The following section illustrates the variables employed in the micro model.\textsuperscript{174} As mentioned I use the third wave of the WVS. In Egypt the third wave was surveyed from July 2000 to January 2001, and in Morocco from January 2000 to December 2004.\textsuperscript{175} Therefore the applied data used falls into the formerly described period of rising protest activities in both countries. The data contains 9515 face to face interview respondents, 6051 Egyptians and 3464 Moroccans.\textsuperscript{176}

The dependent variable of the micro data analysis is weighted protest activity index. Therefore, I run several multivariate regression analyses: One model to depict the influence of political deprivation, one model which is derived from the assumptions of economic deprivation and one including both deprivations and political opportunity structures. All three models will be calculated separately for Egypt and Morocco. Besides statistical issues, surveying in repressive regimes could be squeezed by social acceptability: Respondents might fear the possible reaction by the regime. Even if respondents are asked anonymously, they might still fear to be exposed to any sort of punishment by the regime.\textsuperscript{177} Nevertheless there are no statistical methods to uncover such biases. Therefore we should keep such restrictions in mind when analysing our results.

\footnotesize
\textsuperscript{172}http://www.worldvaluessurvey.org.
\textsuperscript{173}The WVS also contains data on Jordan, Saudi-Arabia and Algeria. Unfortunately the dependent variable used has only been asked in the third wave of the WVS and is therefore only available for Egypt and Morocco.
\textsuperscript{174}For an overview of some key data on the used variables please see: table 13 on 103.
\textsuperscript{175}For further technical details for Egypt and Morocco, please see: http://www.wvsevsdb.com/wvs/WVSTechnical.jsp.
\textsuperscript{176}Respondents in Egypt were asked and answered in Arabic, Moroccans also in French.
\textsuperscript{177}For a comparable argument, please see amongst others: Horne (2011).
Protest Activity

Protest activity is measured with a weighted additive index consisting of five items, each of which asking whether or not a person has taken part or would take part in one of the following requested political activities: petitions; boycotts; lawful demonstrations; unofficial strikes; occupation of buildings. Since missing values are common in some of these items – ranging from $N = 439$ for petitions to $N = 4482$ for occupations of buildings – treating the five activities separately is inadequate. This often results in an analysis of a small sample and therefore some further methodological questions arise. Thus, I decided to construct a weighted index of protest activity in order to include enough observations for the multivariate regression analysis.\footnote{Please see figure 14 on page 105 in the appendix for an overview of the missing observations.} Firstly, I counted the number of activities respondents actively participated in; this methodology is well established. As a result the index counts people’s actually protest activity: It measures which respondents self-reported that they did one of the underlying activities.\footnote{For a comparable approach please see, amongst others: Norris (2002); Inglehart (1997); (Dalton and van Sickle 2005: 4).} Respondents indicating that they never took part in one of the activities nor would probably engage in one have both not been counted as protestors. Secondly, most scholars exclude petitions from their analysis. The reason for an exclusion is justified by the conditions of such an act: Signing a petition is a basic democratic right, thus recognized as an orthodox activity. But they miss one important point: What is true under democratic conditions might not be true under autocratic reign. Signing a petition means putting one’s signature under a document which is open to the public and furthermore the regime. Depending on the content of the petition, signing could be illegal or at least dangerous under autocratic rule. Consequently – in contrast to other studies – petitioners are also counted in my index. Thirdly, scholars largely agree that protest activities should be weighted depending on the intensity of the activity.\footnote{Critics might argue that weighting protest activities is rather inductive. Nevertheless not weighting them means treating every protest activity the same, which is from my point of view more problematic and moreover empirical falsifiable.} However, weighting the activities on a purely inductive method – like Dalton and van Sickle (2005) – should not be the idea of recoding the data. I decided to put the protest activity into an ordinal rank ordering with increasing intensity – petitions, boycotts, lawful demonstrations, unofficial strikes, occupation of buildings – in giving each activity an increasing weight ranging from one and to five. The result of this calculation is my dependent variable, individuals’ protest activity. Since this is a counting variable, it is metric and therefore multivariate regression analysis is calculated.

As previously mentioned, social acceptability could be an issue biasing the results in authoritarian regimes: Many persons might have engaged in protest activities, but refuse to admit they ever did. However, it is unlikely that the opposite is true: People living under authoritarian rule are less likely to indicate that they have ever engaged in protests.
without having done so. As a result we can rather be sure that Moroccans and Egyptians declaring that they have engaged in protest, in fact did so. From this point of view the dependent variable should be a fairly good indicator for measuring Egyptians’ and Moroccans’ protest activities.

Calculation of Political Value Expectations

My identification of critical citizens reproduces the steps taken by Qi and Shin, yet disagreeing in one important point: My critical citizen does not necessarily criticise the established political institutions.\textsuperscript{181} The background for this decision emerges out of the questionnaire: It only requests validation of the government, parliament, courts and police. So to say, it never confronts the persons in charge. This would frankly be kind of odd, since this could possibly help the regime to partly identify the opposition. Since protests overwhelmingly confront the regimes in charge, using such measures – e.g. evaluation of the parliament – does not seem reasonable. As mentioned before, my critical citizens have two crucial features: Firstly they need to support democracy, secondly they must reject other political regimes. Therefore the answers benchmarking democracies will be summed up on and standardized into scores on a 1-100 point scale. The same will be done for the three questions on antiauthoritarianism.\textsuperscript{182} Factor analysis shows, that the four democracy indicators and the three autocracy indicators measure two different factors.\textsuperscript{183} Therefore summing the indicators up and interpreting them as a dichotomous measurement of democracy versus autocracy is plausible. I split the sum of both indexes into two groups using the median as a cut-off point like Qi and Shin: Since the original scale of the seven democracy versus autocracy scales are ordinal, I made sure not to cheat on the scale of the summarized index by using dichotomized ratings for low and high categories.\textsuperscript{184} As a result I got two dummy variables: A “democratic citizen” – the ones who rate high on the summarized index – and an “authoritarian citizen” – the ones who rate low on the summarized index. The calculated dichotomous measurement expresses people’s value expectations, but not their value capabilities.

Calculation of Political Value Capabilities

Besides value expectations, value capabilities might also play a crucial role accounting for people’s grievances. Nevertheless, respondents in the WVS only had to evaluate democratic institutions and not the rulers in charge. From a methodological point of view I do not expect people’s value capabilities – as measured in the WVS – be of crucial importance

\textsuperscript{181}Qi and Shin (2011: 250).
\textsuperscript{182}The questionnaire can be found in the appendix A.2 on page 111.
\textsuperscript{183}Please find the factor analysis results in the appendix table 16 on page 107.
\textsuperscript{184}Interestingly the medians of the value expectations variable are identical in both countries. Therefore I computed only one political value expectations variable in the dataset.
for their political protest activity. To check this assumption, I again follow the concept of the critical citizen concept: Firstly, I build an additive index of people’s satisfaction with the parliament, the political parties and the government. Secondly, I split the scale into two categories by using the median as a cutting point. The models in the analysis will be run without and with people’s value capabilities to test whether the measurement is affecting people’s protest activity. Like Qi and Shin (2011) I build a kind of an “interaction” term of people’s value expectations and capability: As table 3 shows – in the lower left corner of the table written in italic – critical democrats are one of four categories which might affect protest activity differently. To test whether people’s political value capabilities matter for the protest activity I run one model including the critical citizen concept: Unfortunately 4029 persons refused to answer the questions or were not even asked the questions asking their political satisfaction across both countries. Therefore, political value capabilities are only included in one model in the following analysis.

**Economic Factors**

The hypotheses chapter mainly reflects on two economic factors: GDP *per capita* and unemployment. Therefore to measure economic deprivation the analysis includes three variables in the individual model. Firstly, a scale of income, which includes a self-positioning income scale. This measurement provides a cross-country comparison of income scales, since every respondent in every country had to rank him- or herself on the same ten point scale. As a result this variable reflects people’s income as perceived in relation to the rest of their society: Individuals themselves evaluated where they believe to be located within their society. Therefore it should be an adequate item to evaluate how much people’s perceived economic conditions matter for their protest activity. Secondly, a class variable, which contains individuals’ self classification on five classes. In contrast to the income scale, this variable does not rely on people’s incomes, but on their general positioning within society. Therefore respondents might not only embrace their economic

---

**Table 3: Overview of the Critical Citizen Concept**

<table>
<thead>
<tr>
<th>Democratic Support</th>
<th>Strong</th>
<th>Weak</th>
</tr>
</thead>
<tbody>
<tr>
<td>Democratic Satisfaction Strong</td>
<td>Satisfied Democrats</td>
<td>Satisfied Authoritarians</td>
</tr>
<tr>
<td>Democratic Satisfaction Weak</td>
<td>Critical Democrats</td>
<td>Dissatisfied Authoritarians</td>
</tr>
</tbody>
</table>

*Source: Author’s own, based on Qi and Shin (2011: 248).*
circumstances, but also other factors influencing their class position – e.g. power.\textsuperscript{185} Although this scale is ordinal, I include it as a quasi-metric variable. Since the scale includes five categories this method is common throughout social science. Thirdly, I recode the employment question to indicate unemployed persons. As a matter of fact an often cited explanation for the Arab uprisings stems from the high unemployment rates, which Arab regimes are held to be incapable of reducing by their citizens.\textsuperscript{186} Therefore this dummy variable tries to test whether the unemployment status is of relevance for people’s protest activity.

\textbf{Opportunity Structures}

Since people are not asked to measure whether they feel repressed, the first idea to measure opportunity structures in the micro model was to use efficacy score, since efficacy reflects individuals’ perceived opportunities for influencing politics.\textsuperscript{187} Unfortunately the WVS does not include such questions for the Arab states.\textsuperscript{188} As a result, the micro data analysis is only capable of reflecting on the impact of organisational structures as perceived opportunities. As explained in the previous chapter, people’s cost benefit calculation might highly depend on opportunistic thoughts: The more people take their demands to the street, the less costly and the more successful protest activities might appear. In order to control whether organisational structures matter for people’s cost benefit calculations I included two dummy variables: One dummy controls for the active/inactive membership of labour unions, the other one for the active/inactive membership of a political party. Therefore the indicator measures organisational structures and directly links to the argument of the resource mobilization school.

As has been argued previously the interest in the source of deprivation should also matter: Individuals who are not at all interested in politics should not intend to be engaged in political protest. To control for this assumption the regression model includes a variable asking for people’s political interest. Since this variable is ordinal and has only four categories, I include the variable as nominal dummies with the category “not interested at all” as the category of reference. Therefore the calculated results always indicate the difference between one category and the reference.

\textsuperscript{185}Needless to say that the scale of income and class positioning are correlating with each other. As table 17 on page 107 shows: The higher somebody ranks him- or herself on the income scale, the higher he ranks him- or herself on the class position scale.

\textsuperscript{186}Sakbani (2011: 131); Tobin (2012: 98); Serajuddin and Verme (2012: 3).

\textsuperscript{187}For a wider explanation and definition of efficacy, please see amongst others: Finkel (1985: 892).

\textsuperscript{188}While the Arab barometer does include one, the Arab barometer does not include Egypt. Since I wanted to analyse two cases, which are included in the micro and in the macro model, I had to stick to the WVS.
Controls

The model controls for age, sex and education. If people get older normally their mobility decreases. Furthermore the costs of taking demands to the street increases. Therefore the model needs to control for people’s age. Yet, I suppose there is a logged relationship between age and protest activity, indicating that protest activity not only shrinks with every year people get older, but that this shrinking accelerates with every single year people get older. Therefore I include the logged age in years. In addition, scholars largely connote that young Arabs have been the major protesters during the Arab Spring. Therefore including age into the model should give us a broader insight if people’s age is directly related to their protest activity. Related to this argument many scholars reflect on education – mostly social capital researchers – as being important for how people perceive their circumstances. As a result, a better education leads to higher likeliness to protest, since more educated people have a better understanding of political mechanism and policy decisions. Furthermore highly educated Arabs often leave their country to study in Europe or the United States. Young Arabs who lived in western democracies for years might also have a significantly different idea of democracy and might be more likely to join protests. Therefore, I compute a “high education” dummy: Arabs, who enjoyed at least some time at the university are coded “1”, while any other educational levels are coded “0”. There might also be a gender gap in protest activity, since many Muslim women traditionally are more responsible for families’ households and kids than for economic or political aspects of life, which is why they might not appear at protest actions. Therefore the micro model also controls for respondents’ gender.

---

189 The questions of the controls are not included in the appendix, except for the education question.
190 This strategy is still uncommon in political science literature. Norris (2006) uses the same measurement in her study on protest activity, see: Norris (2006: 13). Her results underpin that logged age seems to be a more useful approach for theoretical and methodological reasons.
191 Wardany (2012).
192 For a more details explanation of the relationship between education and protests, please see amongst others: Hall, Rodeghier and Useem (1986: 564-565).
4.3 The Macro Model: Measuring Regime Repressiveness and Progressive Deprivation

The following section firstly discusses the employed data containing six Arab states: Mauritania, Morocco, Algeria, Tunisia, Libya and Egypt for the period of 1990-2011. However, the structure of such data implies the need for complex analyzing tools. Since my data is a pooled time-series-cross-section (tscs) dataset it solves the well known small-n problem: I am not analyzing 6 countries, but 6 countries across 22 years. Accordingly, my data consists of 6 cases, and of 22 x 6 = 132 observations.

Pooled tscs-data also face some serious problems, which I briefly discuss in the following section. My dataset combines various data from the SCAD dataset, the Worldbank, the political terror scale, the polity IV project, freedom house indicators and the database of political institutions. Using tscs data is not common in the study of protests, most studies do not control for time differences. Having said that the presented model is rather new and unique for the discipline of protest studies.

Anti-Government Actions

The dependent variable in the tscs model is related to the dependent variable of the micro model but differs in two aspects. To generate my dependent variable I used the SCAD data which consists of protest activity in Africa. Firstly, I excluded all events except for demonstrations, riot and strikes. Secondly, I made sure all events had all the same target: The government. As a result the dependent variable of the macro data consists of collective protest actions targeting the government. While this variable measures almost the same activities, it goes one step further because it includes the target of events. Unfortunately the WVS does not ask respondents what they perceived to be the target of their protest activity. Since the title and the subject of my thesis is directly related to when people challenge – or try to challenge – their rulers, this shortcoming of the WVS is infuriating. As mentioned the micro data might have been biased by social acceptability, the macro data is biased by media and ngos’ report coverage: the SCAD data uses both for their coding schemes. Unfortunately especially media is framed by different stake- and shareholders’ interests. Nevertheless the coding scheme seems reliable and the results are double checked with comparable event sets of the PRIO institute.

Political Deprivation

There is no equivalent for measuring political deprivation on the macro level like the micro level: All measurements consisting of macro data include codings of experts and not citizens’ perception living in the polity about their political expectations and capabilities.

\footnote{For an overview of some key data on the used variables please see: table 14 on 103.}
There is a broad range of projects whose goal is and has been to evaluate polities across the globe: Polity IV, Freedomhouse, the Bertelsmann Transformation Index, the World Governance Indicators by the Worldbank, the Vanhanen Index and Cheibub’s and Gandhi’s Democracy Index. All these indices share the common problems of measurement, reliability and variability. Yet, the Polity IV project is the only one covering every state and the entire time period of my case selection. While most studies include binary measurements (democracy versus autocracy)\(^{194}\) or three categories (democracy versus anocracy versus democracy).\(^{195}\) My analysis reproduces a regime classification developed by Goldstone et al. (2010).\(^{196}\) Reason for copying Goldstone et al.’s approach are two problems related to previous usage of the Polity IV data: First, these categorizations have been built to analyse a broad range of cases consisting of a broad range of different regimes, therefore also including democracies and autocracies. Since my case selection does not include any democracies, I need to use an instrument which still guarantees to indicate differences between autocracies and does not categorizes every Arab state as an autocracy. This means the categorization should especially differentiate between partial and full autocracies. Second, the Polity2-scale stays mostly constant across time, the variance within countries is close to zero and in so doing seems rather useless for testing the developed theoretical argument developed for progressive political deprivation. Goldstone et al., use two components included in the linear Polity2-scale to develop a categorical measure of regime types. As indicated in table 4 they build a two-sided Matrix with one variable measuring the competitiveness of political participation (PARCOMP) and one the recruitment of the executive (EXREC). These two dimensions are quite comparable to the ones Dahl (1971) uses in his landmark study about modern forms of governments. These two

\begin{table}[h]
\centering
\begin{tabular}{|c|c|c|c|c|c|}
\hline
\textbf{Competitiveness of Political Participation} & \textbf{(0)} & \textbf{(1)} & \textbf{(2)} & \textbf{(3)} & \textbf{(4)} & \textbf{(5)} \\
\hline
\textbf{Executive Recruitment} & (1) & (2) & (3) & (4) & (5) & (6) & (7) & (8) \\
\hline
\end{tabular}
\caption{Characterizing Regime Types by Goldstone et al. (2010)}
\end{table}

\textit{Source:} Author’s own, based on Goldstone et al. (2010: 196).

\(^{194}\)For example, please see: Przeworski et al. (2000).
\(^{195}\)Marshall, Jaggers and Gurr (2011).
\(^{196}\)Goldstone et al. (2010: 194-196).
measurements allow five classifications for political governments: Full autocracies (white in the table), partial autocracies (light grey), partial democracies (dark grey), partial democracies with factionalism (light black) and full democracies (black). In contrast to Goldstone et al. Due to my case selection, the three democracy categories do not exist within the data. The regime type indicator reports 29 full autocracies, for instance Libya – “systems that combine an absence of effective contestation for chief executive with repressed or suppressed political participation” – and 103 partial democracies for instance Egypt – “[systems] hold competitive elections for national office but repress or tightly control participation or allow substantial political participation but fail to subject the office of chief executive to truly competitive elections.” The regime indicator therefore seems capable of testing if the argument of progressive political deprivation holds true for the underlying cases, expect that partial autocracies face more anti-government actions than full autocracies.

**Economic Factors**

The economic indicators are straightforward: I include GDP *per capita*, inflation and unemployment. The data was downloaded from the World Development Indicators of the Worldbank. Since the macro model tests Davies’ j-curve effect, these indicators basically fulfill the required tasks. Yet, it would be interesting to check differences between the Gini-coefficient and GDP *per capita*. Unfortunately the former mentioned is only available for some of the countries of NA and only surveyed every five years. For this reason the Gini-coefficient cannot be included in the data. Similar missing data problems exist for unemployment. For some countries there is no unemployment data available and for others some points in time are missing. I solved this problem by using linear interpolation for countries only possessing less than three missing data points across the 22 years.

**Opportunity Structures**

The main purpose of the macro model is to test whether the learning hypotheses of the theory sections holds true: Did Arabs really learn about their political activities? To test this hypothesis the model includes the Amnesty indicator of the Political Terror Scale (PTS) to measure the impact of repression on anti-government actions. The PTS was one of the first quantitative datasets to evaluate state violations of human rights, it is a standards-based human rights data set created by a group of colleagues at Purdue University in the early 1980s. During the last decade it emerged to become the most commonly used indicator of state violations of citizens’ physical integrity rights.

197 Goldstone et al. (2010: 195).
198 This is the case for Tunisia and Mauretania. I used the development of GDP *per capita* to interpolate the unemployment data.
199 Wood and Gibney (2010).
PTS includes two scales of such repressions which both consist of five categories evaluating such violations by states: One is built on reports of the State Department and one on reports of Amnesty International.\textsuperscript{200}

Some scholars combine both indicators, some only use one. I decided to do the latter: The variation of the Amnesty indicator is smaller. Therefore it seems more capable \textit{ex ante} of explaining the variation of the dependent variable as indicated in figure 8. To estimate the impact of state repression on protest activity I use a lagged version of the PTS indicator: State repression should not affect people’s will to protest today, but tomorrow. Firstly, people need to realise any sort of state repression. Secondly, they need to process the repression. Thirdly, they need to evaluate the degree of repression and how it might effect their future actions. As a result it seems reasonable to use a lagged version of the repression index.

To check whether the inverted u-curve assumption of the contention theory holds true, I follow the methods used by most scholars: I include the standard lagged repression index without any changes and a squared lagged version of the repression index.\textsuperscript{201}

\textbf{Controls}

The controls are straightforward: The years in office of the regime and the number of dead persons during the protest events. The former is related to an assumption often heard from journalists: Many Arab leaders have been in office for two or three decades. After such a long time in office, they just had to fall. Especially since many of them lost substantial amount of their legitimisation over the years.

The number of people who died during the protest events is – just as age in the micro model – included logged. The argument for this method is the same: Maybe two or three dead people are not altering protesters’ cost-benefit calculations for future protests, but the tenths person might alter it. Therefore a logarithmic relationship assumption seems more appropriate than a linear one.

\textbf{4.4 What to do with time-series-cross-section-data?}

Similar to panel data, tscs data face serious statistical problems, which not only need to be known, but accounted for. Nevertheless not accounting for these issues is common in economic and political analyses.\textsuperscript{202} My tscs data consist of annually repeated observations of state indicators, such as Gross domestic product (GDP) \textit{per capita}. The crucial difference between panel data and tscs data is that the former is sampled while the latter is fixed. This difference leads to both major theoretical as well as statistical

\textsuperscript{200}The coding scheme of the PTS can be found in the appendix.

\textsuperscript{201}For comparable methods, please see: Muller and Weede (1994: 53).

\textsuperscript{202}Beck (2001: 271).
consequences. Speaking of the numerous problems related to tscs data there is one important advantage, which made me use this data type: tscs data “solve” the well known small-N problem by collecting data of the examined countries across multiple points in time.\footnote{Kittel (2006: 661).} As my analysis overlooks “only” six states, observing them across 22 points in time leads to having 132 observations to my disposal. If I did not use a tscs approach, I could only be able to observe six countries at different points in time or use arithmetic means: Consequently I would not be able to observe changes across countries and time. As a result my method makes sure to control for country and time differences. Francisco (1995) gives an overview on research on repression and concludes that most studies underestimate the factor of time: As indicated in the theoretical section, repression today could inflame protest tomorrow.\footnote{Francisco (1995: 265).} Therefore I expect a deeper insight into the effects of repression by calculating a pooled analysis across 22 years for six countries.

The basic issue with tscs data relates to the violation of the Gauss-Markov assumptions:

\[
\text{equation 1: } E(\epsilon_{i,t}\epsilon_{j,s}) = \begin{cases} \delta^2 & \text{if } i = j \text{ and } s = t \\ 0 & \text{otherwise.} \end{cases}
\]

That is: Each error \((\epsilon_{i,t})\) is independent and identically distributed.\footnote{where \(t\) is time; \(i\) and \(j\) are the units in equation 1.} Therefore Ordinary Least Squares (OLS) regression is insufficient, for the standard errors possibly being incorrect. Additionally the errors could be subject to \textit{a)} autocorrelation (observations are not statistically independent) \textit{b)} heteroskedasticity (observations scatter differently through time) \textit{c)} contemporaneous correlation (observations tend to correlate across countries).\footnote{Plümper, Troeger and Manow (2005: 329).} I run regression with panel-corrected standard errors with a first-order autocorrelation AR(1) model and fixed country and time effects. In their landmark study on tscs analysis, Beck and Katz (1995) show that we need to include either a time lagged dependent variable or use autoregressive models to correct for autocorrelation.\footnote{Beck and Katz (1995: 637-638).} I decided to use AR(1), since the coefficient of a lagged dependent variable: Firstly, often harshly affects the significances and coefficients of other independent variables because it is the dependent variable lagged by one year. These models often are dominated by the lagged dependent variable. As a result the impact of other independent variables could be over- or underestimated.\footnote{For a broader discussion of this issue, please see: Achen (2000).} Secondly, there is no theoretical reason to expect the whole model as being influenced by anti-government actions of the past. I also run analyses with fixed time and country effects to estimate if some countries differ from others and if there is a variation across time. I decided to run fixed time and country effects, since the observations in my
sample are not statistically independent from each other: Egypt in 2000 influences Egypt in 2001. However, results of pooled analyses often highly depend on the modeling of the problems explained. To control whether my results are robust across model designs, I also include a model with a lagged dependent variable.

I ran a Hausman test to check whether a fixed model or a random model should be calculated. The result is underpinning my decision. The null hypothesis – that the preferred model is random effects – must be rejected, since the results for the test are significant on the five percent level. The test can be find in the appendix table 15 on page 106.

The problem of inconsistent results is best described in: Kittel and Winner (2005). In their re-analysis of Garrett and Mitchell (2001), Kittel and Winner show the impact of using lagged dependent models versus autoregressive models.
5 Analysis

This chapter presents the results of my thesis. Firstly, the results of the micro model are discussed. Followed by the results of the pooled macro data analysis. I reflect on the postulated hypotheses and the described impact of the controls. Both sections end with a summary of the results.

5.1 Relative Deprivation in Morocco and Egypt

The following analysis proceeds as follows: Firstly, I compare political deprivation in Morocco and Egypt. Secondly, I include economic factors in both models. Thirdly, opportunity structures are added. However, the Egyptian model has certain shortcomings, since both protest activity and union or party membership is scarce for the asked Egyptians.

5.1.1 Political Deprivation

Table 5 shows the results of a bivariate regression analysis: People’s value expectations matter for the dependent protest activity in both countries. The first results underpin the assumption of democrats living under authoritarian rule being more likely to take part in protest than authoritarians. This effect is statistically significant at the one-percent level in both countries. Furthermore, my first hypothesis cannot be rejected at this stage.

<table>
<thead>
<tr>
<th></th>
<th>Egypt</th>
<th>Morocco</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Protest Activity Index</td>
<td>Protest Activity Index</td>
</tr>
<tr>
<td>Democrat vs. Authoritarian$_1$=Democrat</td>
<td>0.695***</td>
<td>0.507***</td>
</tr>
<tr>
<td></td>
<td>b</td>
<td>0.267</td>
</tr>
<tr>
<td></td>
<td>(0.032)</td>
<td>(0.063)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.229***</td>
<td>0.469***</td>
</tr>
<tr>
<td></td>
<td>(0.025)</td>
<td>(0.048)</td>
</tr>
<tr>
<td>adj. $R^2$</td>
<td>0.071</td>
<td>0.021</td>
</tr>
<tr>
<td>N. of cases</td>
<td>5981</td>
<td>2900</td>
</tr>
</tbody>
</table>

Unstandardized bs and standardized Bs.
* p<0.10, ** p<0.05, ***p<0.01.
Political deprivation seems to have a stronger effect in Egypt than in Morocco: While in Egypt a Democrat is more likely to join protest by a b of 0.695 than an authoritarian, his Moroccan counterpart is less likely to join a protest by a b of 0.532. In addition, in Egypt people’s political value expectations account for more than seven percent of the explanation of the variance of the dependent variable. In Morocco only 2.5 percent of the dependent protest activity can be referred to people’s value expectations. In sum this first simple calculation underpins my first hypothesis: people’s political deprivation matters more for people’s protest activity in Egypt than in Morocco. Table 6 pictures the

Table 6: Impact of Political Deprivation on Protest Activity (Multivariate Regression Analysis)

<table>
<thead>
<tr>
<th></th>
<th>Egypt Protest Activity Index</th>
<th>Morocco Protest Activity Index</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b</td>
<td>B</td>
</tr>
<tr>
<td>Democrat vs. Authoritarian$_1$=Democrat</td>
<td>0.659*** (0.033)</td>
<td>0.253 (0.046)</td>
</tr>
<tr>
<td>Gender$_1$=Men</td>
<td>0.106*** (0.033)</td>
<td>0.041 (0.058)</td>
</tr>
<tr>
<td>Age$_{logged}$</td>
<td>-0.192*** (0.044)</td>
<td>-0.057 (0.092)</td>
</tr>
<tr>
<td>High Education$_1$=University</td>
<td>-0.204*** (0.034)</td>
<td>-0.076 (0.053)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.967*** (0.162)</td>
<td>-0.967*** (0.331)</td>
</tr>
</tbody>
</table>

Unstandardized bs and standardized Bs.
* p<0.10, ** p<0.05, *** p<0.01.

results with the three controls – sex, age and education – included. While the effect of political expectations remains constant in the Egyptian case, it decreases significantly in the Moroccan model: Gender and education seem to play an important role in the Moroccan case. Having ever been to a university increases the probability to protest by more than ten percent, while being a democrat only increases the chance by little more than a factor of three. Comparing the beta coefficients underpins this result: With a beta coefficient of 0.26 the education dummy has the strongest influence in the Moroccan model. The controls in this model account for seven percent of the explanation of the variance of the dependent variable. In contrast, the effect of political expectations stays

---

Footnote 211: Since the two sample sizes differ harshly, I also calculated the models with comparable sample sizes for both countries. Nevertheless the costs of such a method are high – you have to create a new data file for each regression – and the benefits low: In my case the differences are of purely cosmetic nature as can be shown in table 18 on page 108. The reason for this is that even the Moroccan model has a comparable large N and therefore the coefficients and significances are not affected by the sample size.
relatively constant in the Egyptian model. The controls also decrease the influence of Egyptians’ political expectations, but value expectations still have the strongest influence. Interestingly, in the Egyptian case age and education both hold a negative algebraic sign in the second model. While the effect of the age variable is significant in the Egyptian and Moroccan model, in both cases the influence of the variable is too small to assign any meaning to it. Nonetheless, the difference of the education effect in both countries is meaningful: While Egyptians with higher education are more likely to refuse protest activity, their Moroccan counterparts are more likely to join protest activities. This hints towards an educational gap between both countries: In the data sample only 20 percent of the Moroccans enjoyed higher education, while 35 percent of the Egyptians had at some point in their lives visited a university. While education and literacy are still on a comparable low level in Morocco, Egypt underwent some major increase in both indicators in the last two decades.\textsuperscript{212}

So how can we explain the discrepancy of the education effect in the sample? Many studies undertaking research on education in Egypt outline, the failure of schools and universities to promote or support democratic values and practices.\textsuperscript{213} Therefore Egyptian students might be more affected by a promotion of non-democratic values, since they are listening to teachers or professors longer than Egyptians who never went to any university. Nevertheless, this is an assumption on how we could explain this effect, though we still need to check where Egyptian students asked in the WVS attended university.\textsuperscript{214}

In summary the first two calculated models confirm the hypothesis that democrats in Egypt might feel more deprived and therefore their protest activity is higher than in Morocco. Furthermore, value expectations seem to be shared on a comparable degree in both countries: The median of the index of the seven democracy and autocracy measurements is the same for Egyptians and Moroccans with a value of 91.6 on a 200 point scale. As a result, Egyptian and Moroccan value capabilities seem to differ harshly, which should be the reason for the Egyptian democrats to be more likely to bring their demands to the streets. As outlined in the method section, I expect that the measurement of political satisfaction in authoritarian settings is not a reliable measurement, since only democratic institutions are asked to be evaluated. Therefore the achievements of people in charge – in Egypt President Mubarak and in Morocco King Mohamed VI. – are not evaluated. As a result, 62.5 percent of the interviewed Egyptians are satisfied with their parliament, parties and government. In Contrast only 46.2 percent of the Moroccan respondents are satisfied with their parliament, parties and government. While this seems to underpin a huge gap between Egyptians’ and Moroccans’ political value capabilities, only 48 per-

\textsuperscript{212}For a comparable argument, please see: Willis (2009: 234). For the huge discrepancy in Morocco in literacy between urban and rural areas, please see: Achy (2010: 11).
\textsuperscript{213}Baraka (2007); Faour and Muasher (2011: 11).
\textsuperscript{214}Unfortunately the WVS does not include a question which ask whether a student studied abroad.
5 Analysis

cent of the Egyptians respondents answered the three political institution satisfaction questions. In the Moroccan case 74 percent of the respondents answered these questions. Reilly and Zigerell (2012) show that we need to report missing values if we are to discuss the support of democratic values. Unfortunately we do not know why people decline to give certain answers. However, we do know that the missing Egyptians did not pay lip services to being satisfied with their democratic institutions, neither to being dissatisfied with the latter. So these Egyptians might never have thought about an evaluation of these institutions, because they might perceive them as being irrelevant.

As a result, the critical citizen concept does not have any significant effect in the Egyptian case, as reported by the first row of table 7. While the observations drop hugely, not any of the critical citizen dummy variables is reported to have a significant impact in the Egyptian model. Furthermore, due to the dropping number of observations and the critical citizen concept, age, education and gender are also not significant anymore: The model only explains about one percent of the variance of Egyptians’ protest activity. In contrast, in Morocco the critical citizen concept has a significant impact: But even in the Moroccan model only the two democrat variables are significant. Both are significantly different in their impact on protest activity of the satisfied authoritarian (which is the

Table 7: Impact of Critical Citizen Concept on Protest Activity (Multivariate Regression Analysis)

<table>
<thead>
<tr>
<th></th>
<th>Egypt Protest Activity Index</th>
<th>Morocco Protest Activity Index</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b</td>
<td>B</td>
</tr>
<tr>
<td>Satisfied Authoritarian$^a$</td>
<td>0.023</td>
<td>0.003</td>
</tr>
<tr>
<td></td>
<td>(0.210)</td>
<td>(0.112)</td>
</tr>
<tr>
<td>Satisfied Democrat</td>
<td>0.080</td>
<td>0.025</td>
</tr>
<tr>
<td></td>
<td>(0.175)</td>
<td>(0.101)</td>
</tr>
<tr>
<td>Unsatisfied Democrat</td>
<td>0.022</td>
<td>0.006</td>
</tr>
<tr>
<td></td>
<td>(0.179)</td>
<td>(0.098)</td>
</tr>
<tr>
<td>Gender$_1=Men$</td>
<td>-0.048</td>
<td>-0.015</td>
</tr>
<tr>
<td></td>
<td>(0.060)</td>
<td>(0.071)</td>
</tr>
<tr>
<td>Age$_{logged}$</td>
<td>-0.004</td>
<td>-0.001</td>
</tr>
<tr>
<td></td>
<td>(0.076)</td>
<td>(0.106)</td>
</tr>
<tr>
<td>High Education$_1=University$</td>
<td>-0.104</td>
<td>-0.029</td>
</tr>
<tr>
<td></td>
<td>(0.070)</td>
<td>(0.087)</td>
</tr>
<tr>
<td>Constant</td>
<td>1.148$^{***}$</td>
<td>(0.317)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>adj. $R^2$</th>
<th>Egypt</th>
<th>Morocco</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>-0.001</td>
<td>0.094</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>N. of cases</th>
<th>Egypt</th>
<th>Morocco</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>2880</td>
<td>2219</td>
</tr>
</tbody>
</table>


Unstandardized bs and standardized Bs.

* p<0.10, ** p<0.05, *** p<0.01.
reference in the regression analysis for the remaining three critical citizen dummy variables). Yet, the dissatisfied democrat is only significant at the ten percent level and the critical citizen himself – the unsatisfied democrat – on the five percent level. With a b of 0.228 the impact of the critical citizen is also smaller than the influence of the Democrat in the first Moroccan model with controls. The effects of the controls stay constant across the two models in Morocco.

These results reject my first hypothesis, but as explained the missing values in the Egyptian case suggest that the Egyptian model is not reliable for further analysis including political value capabilities. In sum political value capabilities do not seem to matter in the Moroccan model, while many Egyptians refused to evaluate their political institutions. The explanation in the methods section hold true: The measurement of political value capabilities does not seem to be reliable for further analyses in authoritarian contexts. Therefore the following analysis does not include Arabs’ political value capabilities, but only their political value expectations.

5.1.2 Economic Deprivation

The Hypothesis section outlined, that I am expecting a greater impact of economic factors on protesters’ activity in Morocco, due to their perceived economic conditions during the surveying period of the WVS. The argument in the section related to privatisation efforts in both countries, and Egyptians’ historical experiences with socialism. Furthermore it illustrated that economic conditions – unemployment, GDP – were worse in Morocco than in Egypt. Yet – as has often been explained during my thesis –, those absolute numbers could still be challenged by Moroccans’ perceived reality: Maybe Moroccans do not perceive their economic situation as bad as indicators of the world bank make us believe. But the postulated hypothesis holds true: As indicated in table 8 economic factors impose a stronger influence on Moroccans’ than on Egyptians’ protest activity. In order to measure the influence of people’s economic conditions on their protest activity, I calculated three models: One model with people’s social class identification, one with their income and one containing both indicators. All models include unemployment as a dummy variable.

In the first model Egyptians’ social class identification is significant at the five percent level, but has a comparably small impact with a beta coefficient of 0.029. In the Moroccan model, people’s social class identification is significant at the one percent level and has a stronger impact on Moroccans’ protest activity. In cross country comparison people’s class identification is more important in Morocco than in Egypt. Nevertheless, even in the Moroccan model people’s political value capabilities still have a stronger impact than their social class identification. Yet, the gap between the impact of social class identification and political expectations is small. In contrast Egyptians are far more
driven by their political expectations than their social class identification: If an Egyptian is a democrat, his protest activity increases by a factor of 0.66 *ceteris paribus*. In the third model social class identification is not significant, neither in Egypt nor in Morocco. In Egypt the coefficient even receives a negative algebraic sign. The effect of social class identification is neither significant, nor constant across models: The inclusion of people’s income reduces the effect of the social class identification to an insignificant level. This is due to collinearity of the two indicators. Looking at the development of the unemployment dummy across the three models indicates that people’s class identification represses the effect of the latter. Unemployment is significant across all models, but reaches its lowest impact in the model containing social class identification. In conclusion people’s perceived social class identification does not influence their protest activity.

The inclusion of economic factors puts the gender gap in Egypt in a different light: The positive influence of being a man is now significant in all three economic models. Just as their Moroccan counterparts, Egyptian men are more likely to protest than women. Nevertheless the impact of gender differences in the Egyptian case is at best a mediocre one: There seems to be a much bigger gender gap in Morocco than in Egypt. *Ceteris paribus* being a female, shrinks Moroccans’ protest willingness by a factor of almost three. Moreover, including economic factors in the Moroccan models increases the gender impact.

While Egyptians’ age did not have a significant impact in critical citizen model, the economic models reproduce the results of the political deprivation models: Age has a negative and significant impact in Egypt and a positive and significant impact in Morocco. In both countries, people of found age are more likely to engage in protest activities. Yet, Egyptians are more likely to refuse to protest with every year they become older, Moroccans are more likely to protest with rising age.

As can be seen the impact of university education seems to be constant in both countries across various models. While dropping in all three models compared to models without economic factors, the difference of the impact in both countries stays constant. Yet, the impact of the income scale differs harshly from the expected impact: The richer Moroccans or Egyptians are, the more likely are they to protest. Protest activity in both countries is positively linked to people’s income. While university education in Egypt has a negative impact on Egyptians’ protest activity, it fuels Moroccans’ willingness to go on the streets: Across all models university education has the strongest impact on Moroccans protest activity. Even in the third model – which includes social class identification and income – university education increases Moroccans protest activity: A student or former student in Morocco is still more likely to protest by a factor of 0.86, *ceteris paribus*. With the inclusion of economic factors the variance explanation potential of the models rises. Still, the presented model explains more variance of the dependent variable in Morocco than in Egypt.

In conclusion the data used underpins the assumption of economic factors not being
Table 8: Impact of Economic Factors on Protest Activity (Multivariate Regression Analysis)

<table>
<thead>
<tr>
<th>Model 1</th>
<th>Egypt</th>
<th>Morocco</th>
<th>Model 2</th>
<th>Egypt</th>
<th>Morocco</th>
<th>Model 3</th>
<th>Egypt</th>
<th>Morocco</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>b</strong></td>
<td>B</td>
<td><strong>b</strong></td>
<td>B</td>
<td><strong>b</strong></td>
<td>B</td>
<td><strong>b</strong></td>
<td>B</td>
<td>B</td>
</tr>
<tr>
<td>Democrat vs. Authorit.</td>
<td>0.663***</td>
<td>(0.033)</td>
<td>0.256</td>
<td>(0.065)</td>
<td>0.606***</td>
<td>(0.035)</td>
<td>0.237</td>
<td>(0.074)</td>
</tr>
<tr>
<td>Social Class</td>
<td>0.037**</td>
<td>(0.017)</td>
<td>0.029</td>
<td>(0.036)</td>
<td>0.134***</td>
<td>(0.036)</td>
<td>0.073</td>
<td>(0.035)</td>
</tr>
<tr>
<td>Scale of Incomes</td>
<td>0.037***</td>
<td>(0.008)</td>
<td>0.044***</td>
<td>(0.008)</td>
<td>0.125***</td>
<td>(0.021)</td>
<td>0.127</td>
<td>(0.009)</td>
</tr>
<tr>
<td>Unemployment</td>
<td>0.128**</td>
<td>(0.064)</td>
<td>0.025</td>
<td>(0.124)</td>
<td>0.130*</td>
<td>(0.066)</td>
<td>0.025</td>
<td>(0.154)</td>
</tr>
<tr>
<td>Gender\textsubscript{Men}</td>
<td>0.099***</td>
<td>(0.033)</td>
<td>0.039</td>
<td>(0.062)</td>
<td>0.379***</td>
<td>(0.033)</td>
<td>0.036</td>
<td>(0.070)</td>
</tr>
<tr>
<td>Age\textsubscript{logged}</td>
<td>-0.178***</td>
<td>(0.044)</td>
<td>-0.053</td>
<td>(0.094)</td>
<td>0.260***</td>
<td>(0.045)</td>
<td>-0.051</td>
<td>(0.108)</td>
</tr>
<tr>
<td>High Education</td>
<td>-0.224***</td>
<td>(0.036)</td>
<td>-0.084</td>
<td>(0.080)</td>
<td>0.962***</td>
<td>(0.036)</td>
<td>-0.231***</td>
<td>(0.089)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.812***</td>
<td>(0.169)</td>
<td>-1.049***</td>
<td>(0.351)</td>
<td>0.716***</td>
<td>(0.170)</td>
<td>-1.170***</td>
<td>(0.396)</td>
</tr>
<tr>
<td>adj. $R^2$</td>
<td>0.084</td>
<td>(0.169)</td>
<td>0.098</td>
<td>(0.351)</td>
<td>0.088</td>
<td>(0.170)</td>
<td>0.105</td>
<td>(0.396)</td>
</tr>
<tr>
<td>N. of cases</td>
<td>5876</td>
<td>5666</td>
<td>2768</td>
<td>2215</td>
<td>5594</td>
<td>2176</td>
<td>0.091</td>
<td>0.103</td>
</tr>
</tbody>
</table>

Unstandardized bs and standardized Bs.

* p<0.10, ** p<0.05, *** p<0.01.
less important for Arabs’ protest activity than political expectations: While the explanation potential of all models rises if economic factors are included, political expectations remain significant and in the Egyptian case are still the strongest predictor of protest activity. In contrast, Moroccan protesters are mainly driven by their education and their incomes. Nevertheless the political deprivation analysis showed that people’s value expectations seem to be more important than their value capabilities.

Unfortunately the WVS does not provide indicators for the analysed countries, which could be used to estimate people’s economic expectations. Maybe including people’s economic expectations would draw a different picture in Egypt. Furthermore, the economic hypothesis can be confirmed: Economic factors are more important in Morocco than in Egypt. However, I have to reject the assumption that political deprivation is the strongest explanation variable in both countries: Moroccans protest activity highly depends on their economic capabilities.

5.1.3 Opportunity Structures

The last section of the micro model includes opportunity structures: As noted in the theoretical section, people’s interest in an issue might be important for participating in political protest. If a person is not interested in politics at all, he or she will rates the cost for protest quite high, while the benefits are considered to be low: Even if protests might push politicians to change policy decisions at stake, why should a person really care about the change if he or she does not have any interest in politics. Furthermore scholars largely note that protesters’ organisational structure is important for their activity: At a higher organisational level, protest is said to be more likely. Therefore the first model in table 9 includes people’s political interest, the second model their party and union membership and the third model all three organisational indicators.215

The results are astonishing: While in the Egyptian case the adjusted R square drops significantly, the third Moroccan model explains 23 percent of the variance in protest activity. The inclusion of party and union dummy variables in Egypt brings a major problem: Almost every Egyptian is neither a member of a party nor of a union. Furthermore, Egyptians who are party or union members are not protesting at all: Only 10 percent of Egyptians are members of a party or a union and are protesting. As a result, the explanation potential of the overall model is historically low: The organisational membership model explains only 1.6 percent of the variance of Egyptians’ protest activity. Therefore we have to reject the idea that organisational structures matter in Egypt. Besides, party membership is the strongest predictor with a beta coefficient of 0.068 and is significant on the one percent level in the second model, but the overall model is not

215 The WVS includes more membership questions. Yet, the only two membership variables with a significant impact are the union and party membership variables. Therefore the presented analysis only includes this two variables in order to keep the tables as simple as possible.
### Table 9: Impact of Political, Economical & Opportunity Structures on Protest Activity (Multivariate Regression Analysis)

<table>
<thead>
<tr>
<th></th>
<th>Model 1</th>
<th>Model 2</th>
<th>Model 3</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Egypt</td>
<td>Morocco</td>
<td>Egypt</td>
</tr>
<tr>
<td></td>
<td>b, B</td>
<td>b, B</td>
<td>b, B</td>
</tr>
<tr>
<td>Democrat vs. Authorit.</td>
<td>0.600***</td>
<td>0.236</td>
<td>0.239***</td>
</tr>
<tr>
<td></td>
<td>(0.035)</td>
<td>(0.074)</td>
<td>(0.024)</td>
</tr>
<tr>
<td>Social Class</td>
<td>-0.020</td>
<td>-0.016</td>
<td>-0.031</td>
</tr>
<tr>
<td></td>
<td>(0.020)</td>
<td>(0.051)</td>
<td>(0.014)</td>
</tr>
<tr>
<td>Scale of Incomes</td>
<td>0.047***</td>
<td>0.086</td>
<td>0.118***</td>
</tr>
<tr>
<td></td>
<td>(0.009)</td>
<td>(0.026)</td>
<td>(0.007)</td>
</tr>
<tr>
<td>Unemployment</td>
<td>0.151**</td>
<td>0.029</td>
<td>0.421***</td>
</tr>
<tr>
<td></td>
<td>(0.067)</td>
<td>(0.154)</td>
<td>(0.051)</td>
</tr>
<tr>
<td>Interest in Politics</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>... Not Very Interested</td>
<td>0.101**</td>
<td>0.034</td>
<td>0.206**</td>
</tr>
<tr>
<td></td>
<td>(0.043)</td>
<td>(0.086)</td>
<td>(0.024)</td>
</tr>
<tr>
<td>... Somewhat Interested</td>
<td>0.103**</td>
<td>0.038</td>
<td>0.664***</td>
</tr>
<tr>
<td></td>
<td>(0.040)</td>
<td>(0.092)</td>
<td>(0.014)</td>
</tr>
<tr>
<td>... Very Interested</td>
<td>0.262***</td>
<td>0.057</td>
<td>1.441***</td>
</tr>
<tr>
<td></td>
<td>(0.064)</td>
<td>(0.149)</td>
<td>(0.014)</td>
</tr>
<tr>
<td>Gender&lt;sub&gt;1=Men&lt;/sub&gt;</td>
<td>0.056</td>
<td>0.022</td>
<td>0.289***</td>
</tr>
<tr>
<td></td>
<td>(0.034)</td>
<td>(0.071)</td>
<td>(0.022)</td>
</tr>
<tr>
<td>Age</td>
<td>-0.171***</td>
<td>-0.051</td>
<td>0.238**</td>
</tr>
<tr>
<td></td>
<td>(0.045)</td>
<td>(0.108)</td>
<td>(0.032)</td>
</tr>
<tr>
<td>High Education</td>
<td>-0.235***</td>
<td>-0.089</td>
<td>0.637***</td>
</tr>
<tr>
<td></td>
<td>(0.037)</td>
<td>(0.093)</td>
<td>(0.024)</td>
</tr>
<tr>
<td>Union Membership</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>(0.110)</td>
<td>(0.184)</td>
<td>(0.109)</td>
</tr>
<tr>
<td>Party Membership</td>
<td>0.216***</td>
<td>0.068</td>
<td>0.989***</td>
</tr>
<tr>
<td></td>
<td>(0.062)</td>
<td>(0.282)</td>
<td>(0.062)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.683***</td>
<td>-1.242***</td>
<td>0.128</td>
</tr>
<tr>
<td></td>
<td>(0.173)</td>
<td>(0.405)</td>
<td>(0.119)</td>
</tr>
<tr>
<td>adj. R²</td>
<td>0.094</td>
<td>0.151</td>
<td>0.016</td>
</tr>
<tr>
<td>N. of cases</td>
<td>5579</td>
<td>2137</td>
<td>3027</td>
</tr>
</tbody>
</table>

* a. Reference for Political Interest: Not interested at all in politics.
Unstandardized bs and standardized Bs.

* p<0.10, ** p<0.05, *** p<0.01.
Moreover, the effect of the union membership has a negative algebraic sign. While this negative effect is not significant, it still totally rejects my assumptions: Why should union membership lower one’s protest activity? Furthermore, the significant effect of the party membership shrinks to a beta coefficient of 0.044 if political interest is included in the model, and most variables are insignificant: Even the impact of the significant variables — democrat vs. authoritarian, social class, gender and high education — are comparably low, ranging from a beta coefficient of -0.024 (high education) to 0.059 (social class). Yet, the first model shows that political interest is a reliable predictor for people’s protest activity in both countries. In both countries all included interest dummies that were included are not only significantly different from the reference category ‘Not interested at all in politics’, but the effect is also increasing with a progressive political interest. The ordinal political interest is close to a linear effect in Morocco: With every step of increased political interest the b coefficient almost doubles. In summary: The more interested Moroccans and Egyptians are in politics, the more likely they are to protest. However, political interest has a greater impact in the Moroccan models than in the Egyptian ones. So far university education emerged as the strongest and most stable predictor for Moroccans’ protest activity. The third model in table 9 contradicts these results: Being strongly politically interested displaces university education. Political interest meaningfully affects Moroccans protest willingness: If a Moroccan is very interested in politics his protest activity rises by a factor of 1.3. Besides interest in politics membership in a union or party appears to be an important determinant of Moroccans’ tendency to protest. Both membership dummies are significant at the one percent level and have a strong positive impact on Moroccans’ protest activity.

The controls are largely forfeiting their significant impact in both countries: The impact of the gender gap might still be significant in the third model, but its coefficients shrink highly visibly. Nevertheless, the gender gap in Morocco seems to be bigger in Morocco than in Egypt. Even in the third model a Moroccan man is still more likely to engage in protest by a factor of 0.23. Furthermore, the university effect in Morocco stays constant across all models and rises to a b coefficient of 0.787 in the third model. Having enjoyed university in Morocco is the second most important predictor of Moroccans’ protest activity. The logged age loses its significant impact in the last two models and therefore is supposed to be a nonsense correlation, which was uncovered by including people’s party and union membership.

The economic deprivation indicators do not have a constant effect across the calculated models. Moroccans’ income is the only economic predictor with a significant positive impact across all models. In conclusion the hypothesis that political protest highly depends on political conditions must be partly rejected for the analysed cases. While Moroccans income proves to be a relevant predictor of protests, neither people’s
class identification, nor unemployment have significant influences in the presented models including people’s opportunity structures.

Political expectations still have significant impact in all but the weak Egyptian model. In the first Egyptian model in table 9, Egyptians’ political expectations are the strongest determinant of protest activity with a beta coefficient of 0.236 followed by university education with a beta coefficient of -0.089. In contrast, Moroccans’ political expectations are the weakest significant predictor in the third model. As a result, the first hypothesis of my thesis holds true across all calculated models: Relative political deprivation has a larger impact on the approval of protest activity in Egypt than in Morocco.

5.1.4 Summary: Toward a Dominance of people’s Perceptions?

As this section has shown, both hypotheses postulated in the previous chapter hold true: While Moroccans protest activity depends more on economic circumstances, Egyptians protest activity highly depends on people’s political value expectations. Yet, even in Morocco the impact of economic factors is at the end overshadowed by Moroccans’ opportunity structures: Controlling for union and party membership reduces the influence of economic factors to almost not existing in the Moroccan model as shown in table 10. Only the income scale has a constant and robust effect in both countries across the calculated models. However, the algebraic sign of the income scale harshly rejects the idea that only poor people take their demands to the streets: In both countries the income scale has a positive influence on Arabs protest activity. These results seem highly interesting, since they reject the common assumption that Arabs protest due to their economic shortcomings. Furthermore, the assumption holds true that interest in politics highly constrains peoples’ participation activity. For both countries can be shown that higher political interest leads to a higher probability to take demands to the streets. Interestingly while being significant in both models, the impact of higher education is diametral in Morocco and Egypt. In Morocco higher education leads to the expected result that students and former students are more likely to protest. In contrast, Egypt’s university alumni are less likely to protest. As has been explained, this might relate to the indoctrination fund by qualitative studies in the Egyptian education system. In addition, the method to include respondents’ age logged shows some interesting results: In Morocco the impact of logged age was positive, suggesting that if protest was once a privilege of the young, this might have changed. Yet, this result is not significant. Nevertheless, in Egypt protest still seems to be a highly supported by young people. With every year a Egyptian gets older he is more likely not to protest. The Egyptian results for logged age find further support in other analyses of protest activity.

216 Baraka (2007); Faour and Muasher (2011: 11).
## Table 10: Best Fit Models for Egypt & Morocco (Multivariate Regression Analysis)

<table>
<thead>
<tr>
<th></th>
<th>Egypt Proportion Activity Index</th>
<th>Morocco Proportion Activity Index</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>b</td>
<td>B</td>
</tr>
<tr>
<td>Democrat vs. Authoritarian</td>
<td>0.600***</td>
<td>0.236</td>
</tr>
<tr>
<td></td>
<td>(0.035)</td>
<td>(0.107)</td>
</tr>
<tr>
<td>Social Class</td>
<td>-0.020</td>
<td>-0.016</td>
</tr>
<tr>
<td></td>
<td>(0.020)</td>
<td>(0.107)</td>
</tr>
<tr>
<td>Scale of Incomes</td>
<td>0.047***</td>
<td>0.086</td>
</tr>
<tr>
<td></td>
<td>(0.009)</td>
<td>(0.041)</td>
</tr>
<tr>
<td>Unemployed</td>
<td>0.151**</td>
<td>0.029</td>
</tr>
<tr>
<td></td>
<td>(0.067)</td>
<td>(0.366)</td>
</tr>
<tr>
<td>Interest in Politics</td>
<td></td>
<td></td>
</tr>
<tr>
<td>...Not Very Interested</td>
<td>0.101**</td>
<td>0.034</td>
</tr>
<tr>
<td></td>
<td>(0.043)</td>
<td>(0.122)</td>
</tr>
<tr>
<td>...Somewhat Interested</td>
<td>0.103**</td>
<td>0.038</td>
</tr>
<tr>
<td></td>
<td>(0.040)</td>
<td>(0.128)</td>
</tr>
<tr>
<td>...Very Interested</td>
<td>0.262***</td>
<td>0.057</td>
</tr>
<tr>
<td></td>
<td>(0.064)</td>
<td>(0.199)</td>
</tr>
<tr>
<td>Gender</td>
<td>0.056</td>
<td>0.022</td>
</tr>
<tr>
<td></td>
<td>(0.034)</td>
<td>(0.097)</td>
</tr>
<tr>
<td>Age&lt;sub&gt;logged&lt;/sub&gt;</td>
<td>-0.171***</td>
<td>-0.051</td>
</tr>
<tr>
<td></td>
<td>(0.045)</td>
<td>(0.147)</td>
</tr>
<tr>
<td>High Education</td>
<td>-0.235***</td>
<td>-0.089</td>
</tr>
<tr>
<td></td>
<td>(0.037)</td>
<td>(0.137)</td>
</tr>
<tr>
<td>Union Membership</td>
<td>0.558***</td>
<td>0.082</td>
</tr>
<tr>
<td></td>
<td>(0.182)</td>
<td>(0.279)</td>
</tr>
<tr>
<td>Party Membership</td>
<td>0.754***</td>
<td>0.082</td>
</tr>
<tr>
<td></td>
<td>(0.279)</td>
<td>(0.279)</td>
</tr>
<tr>
<td>Constant</td>
<td>0.683***</td>
<td>0.820</td>
</tr>
<tr>
<td></td>
<td>(0.173)</td>
<td>(0.560)</td>
</tr>
<tr>
<td>adj. (R^2)</td>
<td>0.094</td>
<td>0.232</td>
</tr>
<tr>
<td>N. of cases</td>
<td>5579</td>
<td>962</td>
</tr>
</tbody>
</table>

a. Reference group for Political Interest: Not interested at all in politics.

Unstandardized bs and standardized Bs.

* p<0.10, ** p<0.05, *** p<0.01.
In both countries people’s political expectations are significant across all estimated models. As postulated in the hypotheses chapter, the strongest explanation factor for Egyptians’ protest activity by far is the support of democratic values. Yet, we have to enjoy these results with reluctance: The inclusion of union and party membership dummies in the Egyptian model significantly reduces the explanation potential of the overall model. This is because membership in parties and unions under the Egyptian respondents is seldom. Inclusion of dummies lets the observations on the dependent variable drop strongly. However, as has been mentioned earlier, the seldomness of membership in parties or unions seems representative for the Egyptian people. Yet, some scholars note that during the Arab Spring union might have played an important role in the Egyptian case.\(^{218}\) In the Moroccan case political interest and higher education are the most important factors for protest activity. Even in Morocco, where unions are said to be further developed on organizational levels, union and party membership plays a smaller role for Moroccans’ protest activity than income, political interest and education. Furthermore, we have to ask if people join unions or parties \textit{because} they share common values or if people \textit{absorb} certain values due to being a member of a union or a party. Yet, the reason to control for union and party membership should clarify whether organizational structures provide fruitful ground for rising protest activity by lowering transaction costs of information and reducing collective action problems. In the Moroccan case this assumption needs to be strongly supported, but even in the Moroccan case the impact of organizational structures seems to be lower than Tilly and Snyder might have hoped. In summary it seems that political grievances are important in both countries, while being way more important in Egypt than in Morocco. Besides, political deprivation seems to be important in both countries, while the impact of economic deprivation is partly conditional on organizational structures or – in the case of income – diametral to our assumptions. The best Moroccan model fit has a comparable high overall explanation potential. It explains 23 percent variation of the dependent variable.\(^{219}\) The best Egyptian model fit explains almost 10 percent variation of the dependent variable, which lays behind my expectations.

\(^{218}\)Beinin (2011).

\(^{219}\)Norris results for instance only explain 9.5 percent variation of the protest activity in fragile autocracies (Norris 2006: 23).
5.2 Absolute Deprivation: What Macro Models Might Explain

The following section illustrates and interprets the results of pooled tscs analysis. First, I interpret my results before comparing these to hitherto studies on repression. Second, I summarize my results and conclude the pros and cons of the micro and the macro model.

5.2.1 Regime Repressiveness in Authoritarian Regimes

I calculated five models to test the robustness of my results: The first model includes the variables available for all countries and the time period of observation. The second model includes gained oil rents as percent of GDP. Moreover the third model includes the interpolated unemployment rate. The fourth model uses a lagged dependent variable instead of the Prais-Winsten transformation, which is the autoregressive (AR(1)) model. The fifth and last model does not include the fixed time and country effects.

As can be seen in table 11, regime repressiveness is significant on the ten percent level in the first model, but insignificant in the remaining four models. The first model underpins my hypothesis: While the lagged Amnesty repression index holds a negative algebraic sign, the lagged squared repression index holds a positive one. Consequently, there is a u-curve relationship between repression and anti-government actions throughout the Northern African Arab states, but not an inverted one. This result rejects the inverted u-curve argument of power contention theory: anti-government actions are more likely in highly repressive and barely repressive regimes, but not in mediocre ones as stated by Muller, Weede, Eisinger and others. The first model clearly rejects an inverted u-curve relationship and underpins the assumption that Arabs might have learned across time about possible effects of their actions: They might have learned that benefits of anti-government actions might outweigh their costs ceteris paribus. This result holds true across four of the five models. Yet, the influence of regime repressiveness is only significant in the first model. Nevertheless, the u-curve relationship seems to be robust across models. The third model only underpins the assumption of an inverted u-curve relationship, but includes 48 observations less than the first model, which equates to almost 37 percent available observations of the dataset. As a result neither Libya, nor Mauritania are observed in the model with unemployment rates. Far the worst, the most important year 2011 – which illustrates the peak of anti-government actions – is excluded due to missing unemployment rates in that year. Furthermore, besides three time effects, all remaining time effects are significantly different from the reference year 1990. Another hint indicates that the third model does not seem to be capable of explaining the dependent variable across time. With a coefficient of 34.681, the year 2008 appears to be the strongest predictor in the third model. In addition, Morocco cannot be explained with the third model. With a coefficient of -18.163 Morocco tends to less anti-government actions: Including Morocco’s unemployment rates increases the significance of its dummy
and decreases the coefficient of the country dummy harshly.

Table 11: Anti-government Actions and Regime Repressiveness (Pooled Analysis)

<table>
<thead>
<tr>
<th></th>
<th>Model 1&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Model 2&lt;sup&gt;a&lt;/sup&gt;</th>
<th>Model 3&lt;sup&gt;c&lt;/sup&gt;</th>
<th>Model 4&lt;sup&gt;b&lt;/sup&gt;</th>
<th>Model 5&lt;sup&gt;c&lt;/sup&gt;</th>
</tr>
</thead>
<tbody>
<tr>
<td>Antigov. Actions&lt;sub&gt;t−1&lt;/sub&gt;</td>
<td>-7.544 (5.069)</td>
<td>-7.424 (7.757)</td>
<td>4.719 (8.402)</td>
<td>-5.907 (4.612)</td>
<td>-0.282 (4.524)</td>
</tr>
<tr>
<td>Repression&lt;sub&gt;t−1&lt;/sub&gt;</td>
<td>1.443&lt;sup&gt;*&lt;/sup&gt; (0.832)</td>
<td>1.463 (1.168)</td>
<td>-0.868 (1.335)</td>
<td>1.249 (0.763)</td>
<td>0.364 (0.710)</td>
</tr>
<tr>
<td>Death in Protest&lt;sub&gt;logged&lt;/sub&gt;</td>
<td>1.917&lt;sup&gt;***&lt;/sup&gt; (0.417)</td>
<td>2.036&lt;sup&gt;***&lt;/sup&gt; (0.433)</td>
<td>2.322&lt;sup&gt;***&lt;/sup&gt; (0.544)</td>
<td>2.207&lt;sup&gt;***&lt;/sup&gt; (0.426)</td>
<td>2.854&lt;sup&gt;***&lt;/sup&gt; (0.377)</td>
</tr>
<tr>
<td>Partial Autocracy&lt;sup&gt;d&lt;/sup&gt;</td>
<td>5.526&lt;sup&gt;*&lt;/sup&gt; (2.983)</td>
<td>11.647&lt;sup&gt;*&lt;/sup&gt; (6.139)</td>
<td>9.979 (6.268)</td>
<td>7.144&lt;sup&gt;**&lt;/sup&gt; (2.890)</td>
<td>5.569&lt;sup&gt;***&lt;/sup&gt; (1.895)</td>
</tr>
<tr>
<td>Regime Survival</td>
<td>0.146&lt;sup&gt;**&lt;/sup&gt; (0.061)</td>
<td>0.130&lt;sup&gt;*&lt;/sup&gt; (0.075)</td>
<td>0.123 (0.102)</td>
<td>0.167&lt;sup&gt;***&lt;/sup&gt; (0.055)</td>
<td>-0.021 (0.065)</td>
</tr>
<tr>
<td>GDP per Capita</td>
<td>-0.001 (0.001)</td>
<td>-0.001&lt;sup&gt;**&lt;/sup&gt; (0.001)</td>
<td>-0.012&lt;sup&gt;***&lt;/sup&gt; (0.004)</td>
<td>-0.001 (0.000)</td>
<td>0.000 (0.000)</td>
</tr>
<tr>
<td>Inflation</td>
<td>0.228 (0.174)</td>
<td>0.505&lt;sup&gt;**&lt;/sup&gt; (0.216)</td>
<td>0.058 (0.268)</td>
<td>0.209 (0.153)</td>
<td>0.078 (0.132)</td>
</tr>
<tr>
<td>Oil Rents</td>
<td>-0.126 (0.089)</td>
<td>-0.117 (0.337)</td>
<td>0.388 (0.430)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Unemployment</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1991&lt;sup&gt;e&lt;/sup&gt;</td>
<td>2.726&lt;sup&gt;***&lt;/sup&gt; (0.829)</td>
<td>2.532&lt;sup&gt;**&lt;/sup&gt; (1.133)</td>
<td>2.542 (1.639)</td>
<td>-1.042 (7.634)</td>
<td></td>
</tr>
<tr>
<td>1992</td>
<td>0.534 (1.162)</td>
<td>0.929 (1.147)</td>
<td>2.199 (1.536)</td>
<td>-4.502 (7.968)</td>
<td></td>
</tr>
<tr>
<td>1993</td>
<td>1.612&lt;sup&gt;**&lt;/sup&gt; (0.710)</td>
<td>4.167&lt;sup&gt;***&lt;/sup&gt; (1.582)</td>
<td>3.402 (2.232)</td>
<td>-3.187 (7.707)</td>
<td></td>
</tr>
<tr>
<td>1994</td>
<td>1.958&lt;sup&gt;***&lt;/sup&gt; (0.597)</td>
<td>4.127&lt;sup&gt;***&lt;/sup&gt; (1.592)</td>
<td>4.391&lt;sup&gt;**&lt;/sup&gt; (2.080)</td>
<td>-1.655 (7.436)</td>
<td></td>
</tr>
<tr>
<td>1995</td>
<td>-1.393 (1.088)</td>
<td>-0.487 (1.729)</td>
<td>4.557&lt;sup&gt;*&lt;/sup&gt; (2.491)</td>
<td>-5.803 (7.391)</td>
<td></td>
</tr>
<tr>
<td>1996</td>
<td>0.232 (1.177)</td>
<td>2.103 (1.409)</td>
<td>6.305&lt;sup&gt;***&lt;/sup&gt; (2.370)</td>
<td>-4.893 (7.400)</td>
<td></td>
</tr>
<tr>
<td>1997</td>
<td>-0.074 (1.400)</td>
<td>3.394&lt;sup&gt;*&lt;/sup&gt; (1.780)</td>
<td>4.924&lt;sup&gt;**&lt;/sup&gt; (2.384)</td>
<td>-4.940 (6.965)</td>
<td></td>
</tr>
</tbody>
</table>

---
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1.555</td>
<td>1.383</td>
<td>1.523</td>
<td>1.568</td>
<td>1.385</td>
<td>1.309</td>
<td>1.242</td>
<td>1.360</td>
<td>1.529</td>
<td>1.650</td>
<td>1.819</td>
<td>1.661</td>
<td>1.856</td>
<td>(2.536)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(2.232)</td>
<td>(2.154)</td>
<td>(2.167)</td>
<td>(2.322)</td>
<td>(2.236)</td>
<td>(1.798)</td>
<td>(1.782)</td>
<td>(2.076)</td>
<td>(2.116)</td>
<td>(2.197)</td>
<td>(2.173)</td>
<td>(2.239)</td>
<td>(2.495)</td>
<td>(8.150)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(1.167)</td>
<td>(0.672)</td>
<td>(2.795)</td>
<td>(2.709)</td>
<td>(1.768)</td>
<td>(1.420)</td>
<td>(0.277)</td>
<td>(2.003)</td>
<td>(0.221)</td>
<td>(-1.002)</td>
<td>(0.127)</td>
<td>(-0.158)</td>
<td>(1.423)</td>
<td>(15.470)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>-2.599</td>
<td>-3.295</td>
<td>-0.672</td>
<td>2.795</td>
<td>-1.768</td>
<td>-1.420</td>
<td>-0.277</td>
<td>2.003</td>
<td>-0.221</td>
<td>-1.002</td>
<td>0.127</td>
<td>-0.158</td>
<td>1.423</td>
<td>15.470</td>
<td></td>
</tr>
</tbody>
</table>

**Note:** *significant at the 10% level, **significant at the 5% level, ***significant at the 1% level.
Yet, the results of the third model seem to be strongly affected by the low sample size included in the model. Therefore, it seems that the results contradicting my hypothesis are not trustworthy, since the remaining four models underpin my hypothesis.

As assumed earlier, there is a significant and positive effect of deaths per year during protests: With every person dying in an anti-government action event, the number of anti-government action increases. Thereunto, this is an logarithmic effect, meaning at first every single death of a person lets anti-government actions increase incrementally, but dies si with a diminishing marginal utility. At a certain point the slope of the line decreases, followed by a weaker impact of the number of dead individuals on anti-government actions. It seems that with an increasing number of dead persons, Arabs’ protest willingness is less affected. This effect is robust across all calculated models and always significant on the one percent level. While this result is not of much interested at first sight, on the second this means that mankind might not get used to the experience of death: They might get more used to it, but even with the experience of having noticed a lot of dead bodies, people still get more motivated to target their government with protests, strikes and riots with every single following dead like-minded protesters.

The results for the autocracy index are interesting: Partial autocracies face more anti-government actions across all models than full autocracies. This effect is significant in four of five models and by far the strongest effect of all independent variables across all models. While the inclusion of oil rents increases this effect, under consideration of unemployment rates the significance of the effect disappears. Yet, let us keep in mind the number of only 83 observations in this case. But how can we explain this potential disposition of partial autocracies to turmoils and unrest? First, they underpin the results
of state-centered approaches. Regimes allowing competitive elections, but failing to subject the office of chief executive to competitive political actions also face more political instability in studies of state-centered approaches. However, the formerly cited studies largely fail to present a clear theoretical argument for their results: They mainly focus on the mechanisms in partial democracies and lack an explanation of mechanisms in partial autocracies. Yet, my theoretical framework argued that certain expectations might arise out of the partial liberalisation of political rights: Algeria, Egypt, Morocco and Tunisia all underwent partial liberalisations as illustrated in the hypotheses section. Therefore, one explanation for the significant and strong effect of partial autocracies on protest activity might be found in disappointed citizens, who expected further liberalisations but were shocked by stagnating capabilities (e.g. Egypt; Tunisia; Morocco) or even decreasing capabilities (e.g. Algeria). The longitude of Arab leaders’ ruler has a comparable robust effect across the models: The longer a regime is in charge, the more likely it is to be challenged by its citizens. Yet, the coefficients are rather small in comparison to the influences of other independent variables.

The economic factors in the models are of almost no significance: Despite the inflation rate in the second model and the two significant but weak influences of GDP in the second and third model, none of the indicators are significant. Especially the insignificant effects of the oil rents stand in harsh contrast to earlier studies on the effects of oil production in non-democratic contexts. Yet, the negative algebraic signs of oil rents underpin arguments which claim oil wealth undermines regime durability. Arab countries with higher oil rents tend to experience more protest activity than the ones with smaller oil rents. Nonetheless, this effect is not significant. While higher GDP lowers the possibility of anti-government actions, this effect appears to be rather irrelevant with -0.001 and -0.012 in the second and third model. Arabs’ pay checks affect their rebel activity slightly. Therefore my assumption in the hypotheses section holds true: We need to reject Davies’ j-curve argument for the underlying observations. Furthermore, the prices people need to pay show significance in the second model. However, this effect is not robust across the calculated models. Thus, the assumption that rising prices largely affected Arabs’ rebel activity must be rejected for my analysis. Price development does not have a significant impact in my case selection. The interpolated unemployment rate harshly affects other independent variables, but does not have a significant influence in the third model. In conclusion economic deprivation does not seem to have affected Arabs will to take their demands to the streets.

Last but not least, development of time effects in the models is of interest. In the first model all time effects after 1999 are significant, meaning we need to reject the null hypothesis claiming that they are not significantly different from the reference, which is

---

220 See for instance: Goldstone et al. (2000: 432); Goldstone et al. (2010: 196-198).
221 Please see for instance, amongst others: Smith (2004); Sandbakken (2006); Lowi (2004).
1990. This result underpins the illustrated observation that after the millennium, the protest activity of Arabs harshly differed from their rebel willingness in the decade before 2000. As will be shown in the summary section the analysed data clearly underpins the assumption of a learning effect about the efficiency of political actions.

5.2.2 Summary: The End of Repression?

To estimate whether a deep cut between Arabs willingness to protest before and after the millennium exists, I split the dataset into two periods: One period ranging from 1990-1999 and one period from 2000-2011. The results are shown in table 12 and underpin the formerly illustrated results. As assumed in the theoretical section, Arabs seem to have changed their mind about how they think about the costs – meaning repression

<table>
<thead>
<tr>
<th>Table 12: Anti-government Actions and Regime Repressiveness; Two Periods (Pooled Analysis)</th>
</tr>
</thead>
<tbody>
<tr>
<td>------------------</td>
</tr>
<tr>
<td>Reression(_{t-1})</td>
</tr>
<tr>
<td>Reression(_{t-1})^2</td>
</tr>
<tr>
<td>Death in Protest(_{logged})</td>
</tr>
<tr>
<td>Partial Autocracy(^a)</td>
</tr>
<tr>
<td>Regime Survival</td>
</tr>
<tr>
<td>GDP (_{Per\ Capita})</td>
</tr>
<tr>
<td>Inflation</td>
</tr>
<tr>
<td>Constant</td>
</tr>
<tr>
<td>Rho</td>
</tr>
<tr>
<td>R(^2)</td>
</tr>
<tr>
<td>F-test country dummies (prob.)</td>
</tr>
<tr>
<td>F-test time dummies (prob.)</td>
</tr>
<tr>
<td>Obs.</td>
</tr>
</tbody>
</table>

Both models Prais-Winsten transformed FE-Estimates (AR(1)).
\(^a\) Reference countries are autocracies.
C- and T-Effects not pictured.
Standard errors in parentheses.
\(*\) \(p<0.10\), \(**\) \(p<0.05\), \(***\) \(p<0.01\).

222 I used the results of the pooled analysis in the last section to decide where to split the dataset.
223 To guarantee a better readability of the results, country and time effects are not included in figure 12.
– and benefits – meaning perceived outcomes – of anti-government actions. There is a large discrepancy between the impact of repression in the first period and the second period. The first period until the millennium confirms the inverted u-curve relationship between repression and anti-government actions. Even if the coefficient does not have a significant impact, repression has the effects, illustrated by power contention theory: anti-government actions are most likely in mediocre repressive polities. The second period after the millennium stands in harsh contrast to the first period. As argued in my theoretical chapter there is a u-curve effect, which suggests the total opposite of power contention theorists’ arguments: Since the millennium, anti-government actions are most likely in regimes with high and low repression in the Northern African Arab states. What might have kept Arabs from the streets before the millennium, now has a significant impact to bring them on the streets. The same can be stated for the effect of deaths during those events: After the millennium the impact of a dead person during protest events is significant at the one percent level and its effect has quadrupled. This is further evidence that Arabs’ oppressed anger and frustration finally lead to in anti-government actions: They realized change depends on their actions and that their actions performed so far do not have any impact at all. Interesting is the effect of the partial autocracy dummy: It is significant on the ten percent level before the millennium, but insignificant after the millennium. The regime survival variable takes the contrariwise development. This indicates that after the millennium Arabs rebelled against their polities independent from their state structure, but dependent on how long their rulers have been in office. This result further underpins the assumption that Arabs across all six polities were frustrated and tired of the long lasting reign of their leaders. Furthermore, both economic factors are neither significant nor show they an impact in their coefficients: Absolute economic deprivation deprivation does not matter.

The results indicate that Arabs might have learned that protest is not hopeless: Anti-government actions seem to be likely in low and high repressive regimes. These results also clearly reject possible criticism concerning my case selection, since one might argue that my analysis overlooks six states, which all should be declared as being repressive. Nevertheless, as table 12 shows, the inverted u-curve effect existed before the millennium, but has changed diametrically after 2000. This indicates that my results are robust and the learning hypothesis cannot be reject. Yet, further analyses need to be done to stronger support the learning hypothesis: Multilevel analysis could combine both calculated models – the micro and the macro model – to get a clearer picture of the relationship between individual perceptions and key data on the macro level. Maybe the period of the Arab Spring might also result in a rethinking of the efficiency of political repression: Towards the end of political repression.
5.3 Comparison of the Micro and Macro Model

As the analysis of micro and macro data has shown, political structures and their perception seem to highly influence the probability of anti-government actions. Yet the impact of political structures in the macro model is smaller than in the micro model. Nevertheless, both models show significant influences of political conditions on citizens’ protest activity. It seems that the last two decades, which have been characterized by rising tensions in the MENA region, have been dominated by peoples’ political frustration. Both models indicate an j-curve pattern of political deprivation. The partial political liberalizations during the 1990s might have increased Arabs’ value expectations. After Arabs realised that democratic reforms are rather unrealisable promises to underpin authoritarian rule in their countries, they seem to have changed their way of reacting to political repression incrementally. The discrepancy between their value expectations and capabilities increased: They started to rebel.

Interestingly my results show, that economic factors play a marginal role for Arabs protest activity. In the macro model only unemployment in one model has a significant impact. In the micro model individuals’ income scale has a positive impact on people’s protest activity: The better people perceive their income conditions to be, the more likely they are to protest. These results harshly reject the often heard and explained impact of economic conditions on people’s protest activity. Yet, in both models unemployment plays a significant role for protest activity. My interpretation is that unemployment does not only relate to people’s economic conditions, but also works as a social exclusion mechanism. Unemployed people do not only suffer from economic deprivation, but might also feel socially excluded: Stigmatized as the losers of society.

Nevertheless, micro models are vulnerable to the underlying data structure: Especially in authoritarian settings many questions concerning the evaluation of the regime are not asked. This is also an important shortcoming of my micro data analysis: In the Egyptian case individuals’ political value capabilities could not have been included in the model. In contrast the measurement of macro data do not reflect how people perceive their conditions and this fact might impact the interpretation results of such analysis harshly. If we try to observe mechanisms on the micro level by using only macro data, we might underlay nonsense correlations, since these data do not reflect individual’s perception. Reflecting once more on the Marx’ citation: We might miss the palace standing next to the small house. As a result we interpret the small house as a nice living environment, while the owner of the house is throwing stones on the palace.
6 Conclusion

This thesis tried to establish a framework to overlook anti-government actions in six Arab states across the time period from 1990-2011. In addition to this I reflected relevant literature on relative deprivation, cultural studies and power contention theories amongst others. I draw on that literature to develop my own theoretical assumptions.

I developed a relative deprivation argument, which differentiates three possible deprivations – namely political, economic and social deprivation. I furthermore argued that we can put these forms of deprivation in an ordinal ranking by reflecting on their possible sources. Firstly, political deprivation seems clearly linked to the head of the executive in authoritarian settings. Secondly, economic deprivation could also be linked to the working conditions in the employing company (or country) rather than to the head of the executive. It turns out that economically deprived collectives seem less likely to share a common goal for their actions based on frustration. Finally, social deprivation might be shared across a huge collectivity, but the target of action seems even more unclear than in the case of economic deprivation: Whom to blame for if racial stereotypes keep you from sitting in the front row of a bus? Reflecting on these assumptions I tested two hypotheses regarding the impact of relative political and economic deprivation in Morocco and Egypt. As the results show, people’s perception of their economic and political circumstances vary harshly across Arab autocracies. While in Egypt relative political deprivation accounts for the major explanation of protest activity, Moroccans are mainly influenced by their education and political interest.

I furthermore combined the deprivation argument with possible reactions to repression: I rejected the common assumption that repression and protests are in an inverted u-curve relationship. I argued that people living under authoritarian rule while being deprived for a certain time, might rather learn about the efficiency of their possible actions to get rid of their frustration. As a result, deprived people might rethink the costs and benefits of protest activity, since other mechanisms – like elections – fail to end their frustration and in fact increase it. As the macro data analysis showed, Arabs in Morocco, Mauritania, Tunisia, Libya, Algeria and Egypt seem to have learned that challenging their authoritarian leaders through anti-government actions is more efficient than remaining silent. In all six countries, anti-government actions increased in quantity and quality after the Millennium. Even if Arabs faced harsh repression they took their demands to the streets. These results indicate that harsh repression might even fuel anti-government actions and not harm them.
The data analyses show that further research should also try to combine micro and macro data to not misinterpret macro data with reflecting on people’s perceptions. As we have seen people perceive their economic and political circumstances often different than key data on the level of state might let us believe people perceive their conditions. Yet, my analyses suffers from missing data on the individual and state level. Future research could reflect on these results and use further data to build multi analyses to get a clearer picture how micro and macro data are related to each other.

Both models showed significant influences of political conditions on citizens’ protest activity. Nevertheless, it seems that the last two decades, which have been characterized by rising tensions in the MENA region, have been dominated by people’s political frustration. Both models indicate a progressive pattern of political deprivation. The partial political liberalisations during the 1990s might have increased Arabs’ expectations of a future with extended rights, more freedom and increased influence on political decision-making. After Arabs had realised that democratic reforms are rather false promises to underpin authoritarian rule in their countries, they seem to have changed their way of reacting to political repression incrementally. The discrepancy between their value expectations and capabilities increased: They started to rebel.

Yet, this was a first attempt to oversee a complex variety of cases. This is just one jigsaw piece of many others waiting to be understood: What impact had diffusion processes on people’s grievances and on the development of the Arab uprisings itself? If there is a large gap between the legitimisation of monarchs and presidents, what could this mean for the remaining Arab monarchies? Which impact had democratic institutions in authoritarian settings on the people’s aspirations for democracy? However, this study showed that the final “fall of relative deprivation theory” is yet to come.

---

225 Menaldo (2012).
Bibliography


Norris, Pippa. 2006. *Political Protest in Fragile States*. Prepared for the plenary panel PS01 Political Action and Beyond at the International Political Science Association World Congress in Fukuoka, Japan, Thursday 13th July.


Wurzel, Ulrich G. 2009. The Political Economy of Authoritarianism in Egypt: In-
sufficient Structural Reforms, Limited Outcomes. In The Arab State and Neo-Liberal
Globalization - The Restructuring of State Power in the Middle East, ed. Laura Guazzo-


Yoder, Dale. 1926. “Current Definitions of Revolution.” American Journal of Sociology
32(3):433–441.


Zimmermann, Ekkart. 1981. Krisen, Staatsstreiche und Revolutionen - Theorien, Daten
A Appendix

A.1 Appendix 1: Figures and Tables

Table 13: Summary Statistics of Micro Data

<table>
<thead>
<tr>
<th>Variable</th>
<th>Mean</th>
<th>Std. Dev.</th>
<th>Min.</th>
<th>Max.</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Political Capabilities</td>
<td>0.664</td>
<td>1.437</td>
<td>0</td>
<td>15</td>
<td>9247</td>
</tr>
<tr>
<td>Political Expectations</td>
<td>0.572</td>
<td>0.495</td>
<td>0</td>
<td>1</td>
<td>9035</td>
</tr>
<tr>
<td>Social Class</td>
<td>2.526</td>
<td>0.993</td>
<td>1</td>
<td>5</td>
<td>9204</td>
</tr>
<tr>
<td>Scale of Income</td>
<td>4.564</td>
<td>2.141</td>
<td>1</td>
<td>10</td>
<td>8306</td>
</tr>
<tr>
<td>Unemployment</td>
<td>0.07</td>
<td>0.255</td>
<td>0</td>
<td>1</td>
<td>9511</td>
</tr>
<tr>
<td>Union Membership</td>
<td>0.029</td>
<td>0.169</td>
<td>0</td>
<td>1</td>
<td>4212</td>
</tr>
<tr>
<td>Party Membership</td>
<td>0.032</td>
<td>0.176</td>
<td>0</td>
<td>1</td>
<td>4212</td>
</tr>
<tr>
<td>Political Interest</td>
<td>1.989</td>
<td>0.991</td>
<td>1</td>
<td>4</td>
<td>9357</td>
</tr>
<tr>
<td>Gender</td>
<td>0.464</td>
<td>0.499</td>
<td>0</td>
<td>1</td>
<td>9514</td>
</tr>
<tr>
<td>Age_{logged}</td>
<td>3.561</td>
<td>0.373</td>
<td>2.773</td>
<td>4.533</td>
<td>9508</td>
</tr>
<tr>
<td>University</td>
<td>0.298</td>
<td>0.457</td>
<td>0</td>
<td>1</td>
<td>9513</td>
</tr>
</tbody>
</table>

Table 14: Summary Statistics of Macro Data

<table>
<thead>
<tr>
<th>Variable</th>
<th>Mean</th>
<th>Std. Dev.</th>
<th>Min.</th>
<th>Max.</th>
<th>N</th>
</tr>
</thead>
<tbody>
<tr>
<td>Anti-government Actions</td>
<td>5.47</td>
<td>9.202</td>
<td>0</td>
<td>45</td>
<td>132</td>
</tr>
<tr>
<td>Amnesty_{logged}</td>
<td>3.22</td>
<td>0.785</td>
<td>1</td>
<td>5</td>
<td>132</td>
</tr>
<tr>
<td>Amnesty_{logged,squared}</td>
<td>10.977</td>
<td>5.348</td>
<td>1</td>
<td>25</td>
<td>132</td>
</tr>
<tr>
<td>Death in Protest_{logged}</td>
<td>0.839</td>
<td>1.611</td>
<td>0</td>
<td>6.91</td>
<td>132</td>
</tr>
<tr>
<td>Partial Autocracy</td>
<td>1.78</td>
<td>0.416</td>
<td>1</td>
<td>2</td>
<td>132</td>
</tr>
<tr>
<td>Years in Office</td>
<td>15.886</td>
<td>11.31</td>
<td>0</td>
<td>41</td>
<td>132</td>
</tr>
<tr>
<td>GDP per capita</td>
<td>2742.796</td>
<td>2545.031</td>
<td>472.952</td>
<td>15150.156</td>
<td>132</td>
</tr>
<tr>
<td>Oil Rents as % of GDP</td>
<td>12.05</td>
<td>14.835</td>
<td>0.002</td>
<td>64.474</td>
<td>104</td>
</tr>
<tr>
<td>Unemployment</td>
<td>15.425</td>
<td>6.234</td>
<td>8.1</td>
<td>36</td>
<td>92</td>
</tr>
</tbody>
</table>
Figure 12: Collective Actions Targeting the Government in Northern African Arab States

Source: Author’s own
Figure 13: Unemployment in Egypt and Morocco, 1990-2011

Source: Author’s own, World Bank Data (World Development Indicators).

Figure 14: Protest Activity: Missing Values

Source: Author’s own, WVS data.
Table 15: Hausman Test

<table>
<thead>
<tr>
<th></th>
<th>Coefficients</th>
<th></th>
<th>(b-B)</th>
<th>sqrt(diag(V_b-V_B))</th>
<th>S.E.</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(b)</td>
<td>(B)</td>
<td>Difference</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Fixed</td>
<td>-2.100056</td>
<td>-2.670165</td>
<td>.5693084</td>
<td>1.951901</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Lannesty</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>.5210012</td>
<td>.7947368</td>
<td>-.273736</td>
<td>.3216124</td>
<td></td>
</tr>
<tr>
<td>Random</td>
<td>3.28261</td>
<td>3.424586</td>
<td>-.141976</td>
<td>.</td>
<td></td>
</tr>
<tr>
<td></td>
<td>deathanolog</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>.2.601157</td>
<td>.4.721050</td>
<td>-.2.119901</td>
<td>2.361674</td>
<td></td>
</tr>
<tr>
<td></td>
<td>_Iregtyp_2</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>.0064352</td>
<td>.0307594</td>
<td>-.0243242</td>
<td>.0308491</td>
<td></td>
</tr>
<tr>
<td></td>
<td>yrsof</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>.000775</td>
<td>.000237</td>
<td>.000538</td>
<td>.0003136</td>
<td></td>
</tr>
<tr>
<td></td>
<td>gdpcc</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>-.1049504</td>
<td>.0436599</td>
<td>-.1408103</td>
<td>.0501195</td>
<td></td>
</tr>
<tr>
<td></td>
<td>inflation</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

b = consistent under H0 and Ha; obtained from xtreg
B = inconsistent under Ha, efficient under H0; obtained from xtreg

Test: H0: difference in coefficients not systematic

\[
\chi^2(7) = (b-B)'[(V_b-V_B)^{(-1)}](b-B)
\]

\[
= 16.79
\]

Prob>\chi^2 = 0.0188

(V_b-V_B is not positive definite)

Source: Author’s own.
Micro Model

Table 16: Factor Structure of Democracy and Autocracy Items

<table>
<thead>
<tr>
<th>Factor Structure</th>
<th>Factor 1: Democrat</th>
<th>Factor 2: Authoritarian</th>
</tr>
</thead>
<tbody>
<tr>
<td>Democracies are indecisive and have too much squabbling</td>
<td>.93</td>
<td>-.05</td>
</tr>
<tr>
<td>Democracy may have problems but is better</td>
<td>.86</td>
<td>.01</td>
</tr>
<tr>
<td>Democracies aren’t good at maintaining order</td>
<td>.94</td>
<td>-.02</td>
</tr>
<tr>
<td>In democracy, the economic system runs badly</td>
<td>.93</td>
<td>-.01</td>
</tr>
<tr>
<td>Having a strong leader</td>
<td>.21</td>
<td>.51</td>
</tr>
<tr>
<td>Having the army rule</td>
<td>-.37</td>
<td>.44</td>
</tr>
<tr>
<td>Having a democratic political system</td>
<td>.24</td>
<td>.53</td>
</tr>
</tbody>
</table>

Source: Author’s own, WVS data.

Table 17: Income Scale and Social Classification: Bivariate Regression

<table>
<thead>
<tr>
<th>Variable</th>
<th>Coefficient</th>
<th>(Std. Err.)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Scale of Incomes</td>
<td>0.259**</td>
<td>(0.004)</td>
</tr>
<tr>
<td>Intercept</td>
<td>1.363**</td>
<td>(0.021)</td>
</tr>
</tbody>
</table>

N 8174
R² 0.316
F (1,8172) 3779.432

Significance levels: † : 10%  * : 5%  ** : 1%
### Table 18: Impact of Political Deprivation on Protest Activity: Constant Sample Size (Multivariate Regression Analysis)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Coefficient (Std. Err.)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Democrat vs. Authoritarian</td>
<td>0.651** (0.044)</td>
</tr>
<tr>
<td>Sex</td>
<td>0.122** (0.044)</td>
</tr>
<tr>
<td>age</td>
<td>-0.004** (0.002)</td>
</tr>
<tr>
<td>High Education</td>
<td>-0.160** (0.047)</td>
</tr>
<tr>
<td>Intercept</td>
<td>0.396** (0.075)</td>
</tr>
</tbody>
</table>

N = 3062  
$R^2 = 0.079$  
$F_{(4,3057)} = 65.381$

Significance levels:  † : 10%  * : 5%  ** : 1%

### Macro Model

### Table 19: Anti-government Actions and Regime Repressiveness Two Periods C- & T-Effects (Pooled Analysis)

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Repression$_{t=1}$</td>
<td>3.605 (3.066)</td>
<td>-14.767 (10.079)</td>
</tr>
<tr>
<td>Death Protest$_{logged}$</td>
<td>0.699** (0.283)</td>
<td>2.831*** (0.716)</td>
</tr>
<tr>
<td>Partial Autocracy</td>
<td>2.840* (1.520)</td>
<td>3.513 (5.365)</td>
</tr>
<tr>
<td>Regime Survival</td>
<td>0.208 (0.224)</td>
<td>0.328** (0.141)</td>
</tr>
<tr>
<td>GDP per Capita</td>
<td>-0.001 (0.001)</td>
<td>-0.001 (0.001)</td>
</tr>
<tr>
<td>Inflation</td>
<td>0.079 (0.113)</td>
<td>0.296 (0.408)</td>
</tr>
<tr>
<td>Year</td>
<td>Value</td>
<td>Standard Error</td>
</tr>
<tr>
<td>------</td>
<td>---------</td>
<td>----------------</td>
</tr>
<tr>
<td>1991</td>
<td>1.485**</td>
<td>(0.588)</td>
</tr>
<tr>
<td>1992</td>
<td>1.527*</td>
<td>(0.842)</td>
</tr>
<tr>
<td>1993</td>
<td>-0.535</td>
<td>(0.501)</td>
</tr>
<tr>
<td>1994</td>
<td>0.440</td>
<td>(0.649)</td>
</tr>
<tr>
<td>1995</td>
<td>0.703</td>
<td>(1.056)</td>
</tr>
<tr>
<td>1996</td>
<td>1.087</td>
<td>(1.218)</td>
</tr>
<tr>
<td>1997</td>
<td>0.261</td>
<td>(1.533)</td>
</tr>
<tr>
<td>1998</td>
<td>1.560</td>
<td>(1.835)</td>
</tr>
<tr>
<td>1999</td>
<td>0.099</td>
<td>(1.810)</td>
</tr>
<tr>
<td>2001</td>
<td>3.953***</td>
<td>(0.459)</td>
</tr>
<tr>
<td>2002</td>
<td>0.225</td>
<td>(0.688)</td>
</tr>
<tr>
<td>2003</td>
<td>0.449</td>
<td>(1.223)</td>
</tr>
<tr>
<td>2004</td>
<td>0.508</td>
<td>(1.722)</td>
</tr>
<tr>
<td>2005</td>
<td>3.224*</td>
<td>(1.706)</td>
</tr>
<tr>
<td>2006</td>
<td>4.181**</td>
<td>(1.889)</td>
</tr>
<tr>
<td>2007</td>
<td>2.047</td>
<td>(2.108)</td>
</tr>
<tr>
<td>2008</td>
<td>2.752</td>
<td>(2.809)</td>
</tr>
<tr>
<td>2009</td>
<td>3.268*</td>
<td>(1.832)</td>
</tr>
<tr>
<td>2010</td>
<td>2.693</td>
<td>(2.689)</td>
</tr>
<tr>
<td>2011</td>
<td>18.276***</td>
<td></td>
</tr>
<tr>
<td>Country</td>
<td>Coefficient</td>
<td>Standard Error</td>
</tr>
<tr>
<td>-----------</td>
<td>-------------</td>
<td>----------------</td>
</tr>
<tr>
<td>Egypt</td>
<td>-5.756**</td>
<td>0.995</td>
</tr>
<tr>
<td>Libya</td>
<td>-3.077</td>
<td>0.632</td>
</tr>
<tr>
<td>Mauritania</td>
<td>-6.547***</td>
<td>2.206</td>
</tr>
<tr>
<td>Morocco</td>
<td>-11.462*</td>
<td>0.846</td>
</tr>
<tr>
<td>Tunisia</td>
<td>-6.819***</td>
<td>3.573</td>
</tr>
<tr>
<td>Constant</td>
<td>-3.176</td>
<td>12.950</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Measure</th>
<th>Coefficient</th>
<th>Standard Error</th>
<th>T Value</th>
<th>p Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rho</td>
<td>-0.055</td>
<td>0.051</td>
<td></td>
<td></td>
</tr>
<tr>
<td>R²</td>
<td>0.701</td>
<td>0.744</td>
<td></td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>60</td>
<td>72</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* Standard errors in parentheses
* * p<0.10, ** p<0.05, *** p<0.01

A.2 Appendix 2: World Values Survey Questionnaire

Subsequent are listed all used variables of the WVS. The notations before (e.g. e120) the answers indicate the name of the variable in the dataset.

**Dependent Variable:**

**Protest Activity**

Now, I’ll read out different forms of political action that people make, and I’d like you to tell me if you have actually done it, might do, would never do under any circumstances:

e025. Signing a petition.
e026. Participating in a boycott.
e027. Joining a lawful demonstration.
e028. Participating in an unofficial strike.
e029. Occupying a building or a factory.
**Independent Variables:**

**Pro-democratic regime orientations**

I’m going to read off some things that people sometimes say about a democratic political system. Could you please tell me if you agree strongly, agree, disagree or disagree strongly, after I read each one of them:

- e120. In democracy, the economic system runs badly.
- e121. Democracies are indecisive and have too much quibbling.
- e122. Democracies aren’t good at maintaining order.
- e123. Democracy may have problems but it’s better than any other form of government.

**Antiauthoritarian regime orientations**

I’m going to describe various types of political systems and ask what you think about each as a way of governing this country. For each one, would you say it is a very good, fairly good, fairly bad or very bad way of governing this country:

- e114. Having a strong leader who does not have to bother with parliament and elections.
- e116. Having the army rule.
- e117. Having a democratic political system.

**Economic Factors**

x047. Here is a scale for incomes, which group do you fit in – count all salaries, incomes and pensions and indicate the letter which meets your family’s income before paying taxes and other deductions. Indicate your group by deciles.

1 lowest category.

10 highest category.

x045. Sometimes people describe themselves as belonging to the working class, the middle class or the upper class. How would you describe yourself:

1 Upper class.

2 Upper middle class.

3 Lower middle class.
4 Working class.
5 Lower class.

x028. Are you employed now?

1 Full time (30 hours weekly or more).
2 Part time (Less than 30 hours weekly).
3 Works on his own.
4 Retired.
5 House wife.
6 Student.
7 Unemployed.
8 Other (specify).

Opportunity Structures

Political Interest

e023. How far are you interested in politics?

1 Very interested.
2 Somewhat interested.
3 Not very interested.
4 Not interested at all.

Membership

Now I am going to read off a list of voluntary organisations. For each one, could you tell me whether you are an active member, an inactive member or not a member of that type of organisation? (Read out and code one answer for each organisation)

a101. Labor Union.
a102. Political Party.
A.3 Appendix 3: SCAD Data Coding Scheme

Dependent Variable

anti-government Actions

type (categorical): Indicates the type of event according to the following coding scheme:

1 Organized Demonstration. Distinct, continuous, and largely peaceful action directed toward members of a distinct “other” group or government authorities. In this event, clear leadership or organisation(s) can be identified.

2 Spontaneous Demonstration. Distinct, continuous, and largely peaceful action directed toward members of a distinct “other” group or government authorities. In this event, clear leadership or organisation cannot be identified.

3 Organized Violent Riot. Distinct, continuous and violent action directed toward members of a distinct “other” group or government authorities. The participants intend to cause physical injury and/or property damage. In this event, clear leadership or organisation(s) can be identified.

4 Spontaneous Violent Riot. Distinct, continuous and violent action directed toward members of a distinct “other” group or government authorities. The participants intend to cause physical injury and/or property damage. In this event, clear leadership or organisation(s) cannot be identified.

5 General Strike. Members of an organisation or union engage in a total abandonment of workplaces and public facilities.

6 Limited Strike. Members of an organisation or union engage in the abandonment of workplaces in limited sectors or industries.

7 Pro-Government Violence (Repression): Distinct violent event waged primarily by a government authorities, or by groups in explicit support of government authority, targeting individual, or “collective individual,” members of an alleged opposition group or movement. Note that this is initiated by the government or pro-government actors. See code for repression, below.

8 Anti-Government Violence: Distinct violent event waged primarily by a non-state group against government authorities or symbols of government authorities (e.g., transportation or other infrastructures). As distinguished from riots, the anti-government actor must have a semi-permanent or permanent militant wing or organisation.
9 Extra-government Violence: Distinct violent event waged primarily by a non-state group targeting individual, or “collective individual,” members of an alleged oppositional group or movement. As distinguished from riots, at least one actor must have a semi-permanent or permanent militant wing or organisation. Government authorities are not listed as actors or targets.

10 Intra-government Violence: Distinct violent event between two armed factions associated with different elements within the government. These include violence between two legally constituted armed units (e.g. clashes between police and military) or between unofficial militias associated with particular governmental leaders. This code includes events such as military coups.

**Target**

Was the central government the target of the event?

Yes.

No.

Was a regional, provincial or local government the target of the event?

Yes.

No.

**Repression: Political Terror Scale**

1. Countries under a secure rule of law, people are not imprisoned for their view, and torture is rare or exceptional. Political murders are extremely rare.

2. There is a limited amount of imprisonment for nonviolent political activity. However, few persons are affected, torture and beatings are exceptional. Political murder is rare.

3. There is extensive political imprisonment, or a recent history of such imprisonment. Execution or other political murders and brutality may be common. Unlimited detention, with or without a trial, for political views is accepted.

4. Civil and political rights violations have expanded to large numbers of the population. Murders, disappearances, and torture are a common part of life. In spite of its generality, on this level terror affects those who interest themselves in politics or ideas.
5. Terror has expanded to the whole population. The leaders of these societies place no limits on the means or thoroughness with which they pursue personal or ideological goals.