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The Turkish–Syrian War of Attrition: The Water Dispute

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The issues of water and terrorism are often linked to each other in negotiations between Turkey and Syria, the upstream and the midstream riparians in the Euphrates River basin, respectively. This issue linkage and a deep rooted territorial conflict mark these countries' bilateral relations. This article explains and predicts the riparians' propensity to end the issue linkage unilaterally. The results demonstrate a multiplicity of conditions for such behavior. The common view asserting that Turkey has a more powerful position follows a specific set of conditions. The conclusions do not preclude a Syrian superiority over Turkey, or an equality between the riparians in terms of resistance to the temptation to concede unilaterally.

The scarcity of water in the Middle East is a deeply rooted security issue, given the rapid growth of population in the region and global climatic changes. It shapes, either directly or indirectly, conflictive regional relations and is often linked to other dimensions of the dispute. The riparians in basins of the Jordan, Nile, and Euphrates Rivers have developed water conflicts through incompatible and insatiable demands over the flows of these transboundary watercourses. Yet these divergences of interest fueling explicit and implicit bargaining of regional hydro-politics cannot be easily isolated from territorial claims and historical grievances. These sometimes imply a revision of international boundaries.

This article focuses on the Turkish–Syrian interaction characterized by the connected issues of water and terrorism. Turkey and Syria are, respectively, the upstream and the midstream riparians in the Euphrates River basin. Turkey has accused Syria of backing the Partiya Kerkarani Kurdistan (PKK), a terrorist Kurdish organization aiming at the establishment of a Kurdish state in southeast-

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ern Anatolia, and will not agree to fix a flow quota of at least 700 cubic meters of water per second (m^3/s). Syria, on the other hand, permits the PKK and its leader to have shelter in its territory. It perceives Turkey as aiming for regional hegemony by aligning with Israel and controlling the water flow of the Euphrates. The relations between the two countries are highly conflictual, with each riparian expecting the other to give a unilateral concession. The costly result is the attrition of both countries' resources over time. However, if a riparian concedes unilaterally, the outlasting competitor could use the river with no major opposition. This constitutes the benefit of unlimited use of the Euphrates' waters, an insufficient source to satisfy both Turkey's Southeastern Anatolian Project (GAP) and the future Syrian needs in energy and agriculture.

Turkey and Syria still continue to bait each other without having settled the issues of water and terrorism; diplomatic negotiations between the two riparians have not resulted in agreements satisfying both sides. This article analyzes the conditions for the Turkish and Syrian unilateral concessions that end the issue linkage. Its origins are twofold: first, clear and precise treatments of interactions are needed, and second, one must produce analyses to explain and predict events. Descriptive studies reproduce and restate the empirical reality and cannot be used to generate explanations and predictions. As to a few analytical works on the water issues, they do not focus on issue linkages and presume that international agreements are binding.¹ However, we know that countries cooperate out of self-interest and defect whenever they do not profit from an agreement. In addition, these studies do not consider that interactions between states can continue over time. This article attempts to fill this particular gap to some extent.

Two distinct answers to the research question are found: First, if a riparian discounts the future benefit of using the Euphrates and its future costs of continuing the conflict equally, then these evaluations of the future do not affect its current likelihood of concession. In this case, the riparian's respective costs and benefits become the sole determinants of unilateral concessions. The Turkish and Syrian expectations about the future should have an important effect on their present interactions, given global climatic changes and political uncertainties. An important aspect of continuing relations is the present evaluation of the future. Sometimes future agreements are discounted so that they represent lesser values in the present. An impatient decisionmaker prefers to obtain an agreement today, not in the future, and when the future is uncertain and environmental changes loom over the horizon, one has many reasons to be impatient. So, the first finding highlights the conditions under which one should expect such counterintuitive behavior.

A corollary of this result indicates that Turkey is less prone (or equally prone) to concede only when the cost it suffers in the linkage is lower than (or equal to) the Syrian cost. Hence, the research qualifies the general sense that the Turkish upstream position permits it an upper hand in this conflict. For this to happen, the issue linkage must be less costly for Turkey. Otherwise, Syria should have a tougher bargaining position. Thus, it is not obvious that Turkey, being upstream and controlling the river flow, is more powerful than Syria.

If one believes that the future has an impact on today, then the second result seems to be more intuitive. It indicates that if both riparians discount their future benefit of using the Euphrates and their future costs of continuing the conflict differently, then three factors determine any riparian's propensity to concede: the level of cost it suffers at each period, its discounting of them, and the other's discounting of the future benefit. The specific date here is interpreted as a year close to the full realization of the GAP project. It follows that, in comparing the Turkish and the Syrian probabilities of unilateral concession, the benefit factor plays no role. The respective costs incurred over time, the present evaluations of future costs, and the benefit alone permit such comparisons.

Equality or inequality between the probabilities of concession again become possible. For example, Syria should be less prone to concede, given that it highly discounts its future costs, and Turkey prefers to obtain the benefit as soon as possible. Similarly, the Turkish position should be tougher, given that the Turkish future costs do not represent considerable damage, and Syria is getting very impatient to obtain the benefit of using the Euphrates with no major opposition. Softer positions follow the reversals of these conditions.

These answers generally imply that two different classes of explanations can be made: one given a time limit, the other given no such limit, each revealing the difference in factors that play a role in this issue linkage. They all bring new answers to this question, and illustrate how an end to the Turkish–Syrian war of attrition can follow a variety of factors. The first result draws our attention to the riparians' costs of continuing the conflict and of the future benefit. The second result draws our attention to these costs and to the discount factors permitting an interpretation given a time limit. Hence, in contrast to the first result, the second highlights the riparians' present evaluations of the future.

Background of the Conflict and Its Dimensions

The Euphrates originates in eastern Anatolia and then flows through Syria and Iraq. Turkey is the upstream, Syria the midstream, and Iraq the downstream riparian. More than 80 percent of the river's water potential is generated in Turkey. Syria's contribution is around 10 percent, and Iraq does not contribute to the runoff.

The Issue of Water

In the early 1970s, Syria and Turkey began to harness the waters of the Euphrates by large scale irrigation and hydroelectric power generation projects. The realization of these projects also implied that Turkey, Iraq, and Syria should use amounts of water largely exceeding the river's supply. In such a context, the dams are perceived as threats, not as means to store water. However, given the high rate of seasonal fluctuation of the Euphrates, water storage is the paramount task in the basin.

The dams built upstream do not necessarily work against the interests of the midstream and downstream riparians. The Boulder dam in the Colorado River basin provides an example: This dam works upstream as a means for water stor-

age not only for the United States, but also for Mexico, at no Mexican cost, even in the driest periods. This illustrates that the utility of controlled water quantity is greater than the utility of uncontrolled water at greater volumes.² If one also takes into account that the Euphrates' floods are not ideal for crop production, the utility of water supply regularity for all riparians can be better appreciated.

Nevertheless, such arguments do not persuade the riparians under the currently dominant mood of suspicion and rivalry. The riparians' positions with respect to the solution of the problem further illustrate the depth of the water conflict. Turkey proposes a three-stage plan based on optimum, equitable, and reasonable utilization principles. This plan envisages cooperation between Iraq, Syria, and Turkey concerning the quality and the quantity of water, the land they control, and the development of modern systems of irrigation, such as the drip technology successfully implemented by Israel. Contrary to this position, both Syria and Iraq claim that they have historically acquired rights to both rivers, since they have been using them for millennia. Syria, in particular, suggests that the Euphrates must be shared according to a formula computed by the riparians' declarations of water demands and the river's capacity. These positions show how it is difficult to locate a common ground on which fruitful negotiations can be conducted. The impossibility of conducting sound distributive bargaining also implies that there is no room for integrative bargaining that aims at the expansion of common ground.

The Issue of Territory

The common use of a transboundary watercourse, with its potential of creating distribution conflicts between upstream and downstream riparians, doubles the sources of contention in Turkish-Syrian relations. Syria never recognized Turkish sovereignty over Hatay (the Sandjak of Alexandretta); this region was part of French-mandated Syria, and it decided, as an autonomous entity, to be a part of Turkey in 1939.

A direct implication of this territorial issue concerns the Orontes river: The Orontes flows through Hatay, and Turkey is the downstream and Syria the upstream riparian. Yet there exists no satisfactory agreement over the Orontes river; one reason for this is that an agreement over the Orontes would imply that Syria recognizes Turkish ownership of Hatay.

We know that the issue of water is of growing concern for many nations on the globe, and we also know that international politics is largely comprised of conflicts over territory. This mixing of the issues of water and territory creates much room for conflict in Turkish-Syrian relations. With water and territory constituting their main areas of contention, these relations do not look overly positive in terms of reaching short-term solutions.

The Issue of Terrorism

The issue of terrorism between Turkey and Syria countries connects these contentions over water and territory.³ Both countries' perceptions are based on historical

claims and their beliefs about reciprocal policies conducted over the issues of water and support of terrorism. These further complicate the conflict.

Repeated Turkish accusations and its perception of Syrian support of the PKK demonstrates this complexity. The PKK aims at the establishment of a separate Kurdish state in the Turkish territory of southeastern Anatolia, and has engaged in armed attacks against civilians and the military. Turkey claims that the PKK headquarters is located in Syria and that the head of this organization resides in Damascus. Syrian officials affirm that they have granted the leader of the PKK political asylum, but they insist that, in conformity with the agreement reached in 1987 in Damascus during Turkish Prime Minister Turgut Özal's visit, they forced the PKK to move its bases from Syrian territory to the Beqaa valley.

Thus, the diplomatic relations between the two countries are centered around Syrian support to the terrorist activities of the PKK and other subversive groups operating in Turkey, Syrian denials of these charges, and the problem of water. Interestingly, water conflicts are linked to other issues in all transboundary river basins, but the linkage between terrorism and water is rare. It is worthwhile to note here that a similar linkage between terrorism and water arose between Israel and Jordan after the inception of the Palestine Liberation Organization (PLO) at the second Arab meeting held in Alexandria in 1964. This meeting took place due to Arab reaction to the operation of the Israeli National Water Carrier.⁴ Israel then accused Jordan of providing shelter to the PLO, who engaged in sabotage attacks. The expulsion of the PLO by the Hashemite Kingdom then ended that linkage.

The Incompatibility of Perceptions

The cognitive aspect of the conflict deserves a special attention. The perceptions of Turkey and Syria underline mutual suspicions instigating the conflict over the Euphrates. Turkey perceives Syria as simultaneously aiming at grabbing territory in the future and securing its most preferred water level by a variety of means. These means include the support of terrorism. Syria, in turn, perceives Turkey as aiming to retain an upper hand in this region by controlling the water flow from the Euphrates to Syria (and therefore to Iraq). The recent Turkish–Israeli military cooperation agreements (one is secret, and the other permits joint exercises by the respective countries' air forces and navies) could only reinforce this Syrian belief. Accordingly, Syria perceives that the Turkish assessment of Syrian support to terrorism is either groundless or intentional. For Syria, this Turkish assessment could serve two main purposes: to refuse the level of water Syria demands, and to convince Syria to abandon its territorial ambitions for the Hatay region. Unfortunately, these perceptions are unchanged despite several security and water arrangements agreed upon by both countries.

Current Domination of Bilateral Relations by Issue Linkage

The Turco–Syrian security arrangements have been useless in preventing further Turkish suspicions that Syria supports the PKK. For example, Turgut Özal's 1987 visit to Syria resulted in a major agreement whereby Turkey guaranteed a minimum

water flow of 500 m³/s, and Syria promised its cooperation in security matters. A few months later, Özal complained about terrorist activities in Turkey and threatened to cut water flow into Syria. The current Turkish coalition government led by the pro-Islamic Welfare Party signaled its conciliatory attitude with respect to the problem, but this policy change is unlikely to take root since the military and the remaining political parties are deeply opposed to it. The principal source of the conflict is becoming more complex and difficult to resolve as time passes.

The bilateral security agreements of 1992 and 1993 proved to be useless. In 1993, Tansu Çiller, the Turkish Prime Minister, in a message to Hafez Assad, the Syrian President, declared that Syria must prohibit PKK operations in its territory, otherwise there would be no solution to the problem of water. During the trilateral summit meeting between the Foreign Ministers of Turkey, Iran, and Syria in February 1994, Turkish Foreign Minister Hikmet Çetin again brought the issues of water and terrorism into his discussions with Faruk Al-Sara, his Syrian counterpart. These discussions did not improve bilateral relations. Further, the escape of PKK members into Syria in 1995, when Turkey organized military operations in northern Iraq, confirmed Turkish suspicions. Thus, against this background of historical griefs and developments, the issues of terrorism and water are still linked to each other in Turkish-Syrian relations.

This linkage also causes the attrition of both countries' resources. Turkey continues to fight the PKK in its territory, and Syria claims it suffers water shortages. As time passes the conflict evolves and becomes much more complex and difficult to resolve.

The Clock Is Ticking

The GAP is of such a colossal dimension that it envisages the irrigation of 800,000 hectares of land by 2030, will cause changes in the environment, including changes in climate and human migration, and includes seven projects on the Euphrates and six on the Tigris. It will transform an arid but fertile region and result in food security, agricultural diversity, and a maximization of wealth, particularly in that area.

It is pointed out that, around 2030, when the objectives set for the GAP are fully realized, Syria's water allotment will fall from 500 m³/s to, at most, 300 m³/s.⁵ In addition, the quality of water will diminish, due to increased salinization and the use of pesticides and fertilizers further upstream. A basin-wide cooperative effort is therefore urgently needed to outline major principles for cooperation on this issue, however such a cooperation cannot be expected to happen easily given the linked dimensions of conflict. Hence, one can perceive that the GAP's success demands an urgent need for this kind of cooperation.

The War of Attrition

The war of attrition,⁶ a repeated non-zero-sum game (or interaction) where cooperation is not binding but self-enforced by the game rules alone, generates our

explanations. Even though players most prefer concessions by others, they also prefer mutual concessions to unilateral concessions. The worst outcome is bilateral conflict, that is, the case of no concession. Thus, the players' preferences are not diametrically opposed as in zero-sum games, where there is no room for cooperation.

A Repeated Interaction

The repeated feature of the war of attrition captures the empirical reality of ongoing interactions. Imagine the famous chicken game where two cars approach each other at high speed, and unless one car swerves, both drivers will have a deadly accident, a very costly outcome for both. When this interaction takes place only once, then one can model it as two decisionmakers deciding between swerving or not;⁷ however, when this game is engaged in repeatedly, one can start to predict the players' propensities to swerve in the future, given that there is now a history of the behavior of the players.

In our case, the history of past behavior consists of all of the years the riparians clashed and suffered. Hence, the war of attrition describes the Turkish–Syrian issue linkage, no concessions from both sides indicating that the riparians continue to suffer their costs waiting for the other to concede. We will shortly discuss what these concessions mean, but first we must discuss the multiplicity of strategies in the war of attrition.

Actions Versus Strategies

There is a distinction between actions and strategies. The players can only have two actions: to concede and not to concede. The Turkish concession is its signature of a treaty whereby Turkey allows the flow of more than 500 m³/s of water into Syria; no Turkish concession is to continue to flow only 500 m³/s or less. Similarly, the Syrian concession is Syria's banning of all PKK activities in its territory or in territories under its control; no Syrian concession therefore is continuation of its traditional policy with respect to Turkey. The strategies, in turn, are to assign a date to either of these actions. The time variable is measured by years; for example, a Syrian strategy could be not to concede until 2000. It is possible that the players make their decisions to concede simultaneously, however in this case neither obtains the benefit.

The Discounting of the Future and Payoffs

The discount rates play an important role in the analysis of repeated interactions. They measure the present values of the future benefits and costs. Each riparian suffers a cost per year if it does not stop the competition by giving a unilateral concession. If one stops, then it obtains a sum of costs suffered until the time this concession takes effect. However, these costs are discounted over time. This results in a payoff that consists of the sum of discounted costs, but excludes the

cost of competition in the year of concession. The other that further continues the conflict obtains the benefit. Thus its payoff consists of this profit and a stream of discounted costs. However, the benefit also is weighted by a discount factor; for example, if Turkey signs a future agreement to release 700 m³/s of water to Syria, then Syria will obtain a discounted benefit at that time, but at the price of having continued the conflict thus far.

Policy Implications and Interpretations

Equal Discount Rates

This interaction first implies that if a riparian discounts its future costs and the benefit equally, then its timing of its concession does not depend on these rates. This does not mean that the costs of continuing the conflict and the benefit are not discounted over time. Yet, under this condition of equality, the present valuations of future gain and costs are not important in making the decision to concede unilaterally. Only the cost suffered each period and the benefit matter in this case.

Under the condition of equal discount rates for both riparians, let costs vary, keeping the benefit fixed. It then follows that if the Turkish and Syrian costs are equal, then the riparians' probabilities of concession are equal; otherwise they are unequal. An equality of these probabilities means that each year it is equally likely that one riparian concedes, given the other did not do so the year before. Under the condition of different costs, these decisions are not equally likely. To illustrate, choose any year, say the year 2000. Given that Turkish and Syrian costs are equal, it is equally likely that Turkey will agree to release at least 700 m³/s of water from the Euphrates to Syria in 2000, given that Syria continued support of the PKK in 1999, and that Syria will stop support of the PKK in 2000, given that Turkey did not release 700 m³/s of water from the Euphrates to Syria in 1999.

Now assume that the Turkish and the Syrian costs are equal, and let the benefit vary. The probabilities of concession then become less if the benefit increases, and more if the benefit decreases. This, in turn, indicates that the high benefits of using the Euphrates (the other competitor being eliminated) makes a riparian less willing to quit the competition. Similarly, low benefits make the concession decision more likely, given that the other player stayed in the competition in the previous year. We can assert that the benefit is quite high. We have climate changes due in part to global warming, and, as a result, the uncertainty surrounding fresh water resources increases. It is therefore reasonable to deduce that both riparians would not prefer to quit easily, yet high cost factors represent a counterweight to this tendency.

To summarize, higher costs make a riparian more willing to quit. The same incentive exists in case of lesser benefits. Inversely, lesser costs or higher benefits make a riparian less willing to quit. These results indicate that the common sense view of a powerful Turkey is simplistic, given its geographic position.

Unequal Discount Rates

We can relax the assumption of equal discount rates for costs and of the future benefit. The results are more complicated, but we obtain information about a deadline, which we choose to interpret as a year close to the full realization of the GAP. Besides costs, benefits, and discount rates, the elapsed time period determines the probabilities of concession. If a riparian discounts the future benefit to a high degree, then it prefers to obtain the benefit as soon as possible. The interpretation for the discounting of costs is different; a high discount of future costs means that the present values of future costs decrease. Here, what gets smaller over time is not the benefit, but the cost. Hence, a riparian that heavily discounts its costs can continue the issue linkage for a longer period.

If a riparian discounts the benefit and its cost at different rates, then these rates determine its probability of concession along with the elements of cost and benefit. First, if Turkey and Syria discount their costs and the future benefits differently, then we can have equal probabilities of concession, but the conditions become more intricate. The Turkish cost weighted by the Turkish cost discount and the Syrian benefit discount factors must be equal to the Syrian cost, weighted in turn by the Syrian cost discount and the Turkish benefit discount factors. If the discount factors and respective costs satisfy this equality, then it is equally likely that Turkey and Syria will unilaterally concede before the full operation of the GAP.

Second, under the same condition of unequal discount rates, the probabilities of concession can be different before the GAP deadline. Even if Syria's cost is higher than Turkey's, as compared to the case where riparians do not distinguish between the present and the future values of their costs and the benefit, the Syrian probability of concession can be lower than the Turkish one. We should have such discount factors that, when multiplied, they should reduce the future Syrian cost drastically. Given the high Syrian cost of continuing the issue linkage, an extremely small Syrian discounting of cost or an extremely small Turkish discounting of benefit, or both, can render the probability of Syrian concession before the deadline less likely than the Turkish one. Of course, the same calculation applies to the Turkish probability of concession. Turkey should be less prone to concede before the deadline, even if it suffers a great cost but discounts it highly, or Syria is impatient in the obtention of the benefit or both.

The dependence of concession probabilities on both the discount factors of cost and the profit complicates the analysis, because it is not enough to estimate a riparian's cost and the benefit of using the Euphrates waters based on its own best interests. One must estimate not only a riparian's present valuations of its future cost, but also its rival's evaluations of the benefit over a certain period. Such estimates enter into a riparian's calculations to unilaterally stop if the discounting of future costs and benefit are different for both.

It is improbable that Turkey discounts the future benefit highly, since the GAP's full operation means the use of the Euphrates (together with the Tigris) in its own best interests. The time horizon is more or less precise and the project is

currently running on time. This is not the case for Syria: Its sole benefit can only be the result of Turkey's renunciation of the GAP, but this is improbable, so the sooner an agreement allowing Syria at least 700 m³/s is reached, the better for Syria. This can only reduce the Turkish concession probability, even if Turkey suffers a high cost in the issue linkage. With Turkey not discounting the benefit highly, the Syrian probability of unilateral concession can become more likely, even if Syria's cost is minimal or, at most, equal to Turkey's. If Syria's cost is definitively higher, this makes a Syrian concession almost certain, given the almost nonexistent Turkish discount of the benefit.

The factors of cost discount provide another picture. We can assume that the continuation of the conflict is more costly for Turkey, given its transfer of resources from other sectors of its economy to its fight against terrorism. Thus, even if Syria prefers early agreements and thus reduces the Turkish cost, a low Turkish discount of cost can still make the Turkish probability of concession greater. In other words, with Syria preferring early agreements and Turkey suffering costs as high in the future as they are today, it is possible to have a Turkish concession to agree to allocate Syria at least 700 m³/s of water before the deadline.

The superimposition of these two pictures reflects the complexity of the situation. Present valuation of the future is an area where negotiators can conceal and distort information to deceive each other. These tactics can cause false impressions that, in turn, lead to erroneous beliefs as to whether it is beneficial to concede. Negotiators can safely be assumed to know their countries' costs, benefits, and present valuations of the future. Knowledge about the other riparians' discounting of future costs and benefits is usually missing or incomplete. Consequently, the conflict may continue for the wrong reasons.

As the present values of future costs and the future benefit are intuitively different, the second set of results is more meaningful. However, they imply the accomplishment of a difficult task for the negotiators and policymakers: the estimation of how impatient the other riparian is in the obtention of the benefit. Syrian policymakers should estimate the Turkish evaluation of the future benefit, and, similarly, Turkish policymakers should do the same calculation for Syria. The Syrian support of the PKK is definitely very costly for Turkey, but Turkey knows how much it suffers and how costly this support will be in the future. The more acute the Syrian need for the obtention of the benefit becomes, the less the impact of the Syrian support to the PKK on the Turkish concession. Hence, in their attempt to force Turkey to concede, the Syrian policymakers must be sure they do not give the impression that they are extremely impatient to obtain the benefit. This means that they must conceal their water needs and shortages. The same logic applies to Turkey, as well: Turkish negotiators must be careful in revealing how much they value the benefit. As they know that the Syrian policymakers know how seriously they are hit by the Syrian support to the PKK, they must give the impression that they value almost equally the obtention of the future benefit. In this, they are helped by their upstream water development; they can afford the luxury of looking like they are almost indifferent as to whether

they have the most profitable use of the river now or in the future, so a small deviation from their current upstream water developments, that is, the GAP, will surely be interpreted by others that Turkey is more prone to quitting the competition.

Conclusion and Extensions

In summary, we assumed that both riparians are in a conflict repeated over time. Every time they do not end the competition, they suffer a cost for continuing the issue linkage; their costs are discounted as well. They are assumed to have a finite number of strategies indicating when to stop and when to stay in the competition. The one who concedes loses the future benefit, but does not suffer future costs. The one that continues while the other quits obtains the benefit at the cost of having continued the conflict so far. Under these assumptions, one obtains the probabilities of concession for each country. Two types of results are obtained: If the riparians discount their cost and benefit equally, these probabilities depend solely on profit and cost. If not, these probabilities then depend on the factors of discount as well. These probabilities do not point out that Pareto-optimal agreements are impossible. The sufficient and necessary condition for obtaining such agreement probably is the end of the issue linkage. The general picture the results paint indicates a delicate balance: Turkey suffers greatly from the Syrian support to the PKK but it can be patient for the future, and Syria seems to be impatient to extract a Turkish concession for dividing the Euphrates, but currently obtains at least 500 m³/s of water (and approximating 1000 m³/s on average for the time being). Therefore, the Turkish cost is definitely higher than Syria's, and Syria's impatience regarding the future benefit is higher than Turkey's.

Three extensions of this model are feasible: First, the time variable can be continuous rather than discrete; second, each riparian can have incomplete information about the other's evaluations of the future, including the factors of cost and the benefit;⁸ third, by including a probability that indicates a riparian's endless engagement in the issue linkage, we can study the implications of irrational behavior.⁹

In general, this article contributes to the understanding of the issue linkage by applying a game-theoretical perspective, by clarifying the probabilities of ending it, and how riparians' present evaluations of the future affect their interaction. This approach permits the deduction of precise results and provides a starting point for efforts to fill a particular lacuna in the water literature, i.e., to describe both the process and the outcomes of issue linkages in many water conflicts in terms of strategies, payoffs, and preferences. The Turkish–Syrian water conflict is only one of them, but it can quickly destabilize the Middle East.

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