Supplemental Appendix: Extensions and Additional Results for "Reelection and Renegotiation"

Contents:

A. More Choices for Voters. Our base analysis supposes that domestic voters choose between a relatively *friendly* DG_2 with valuation $\overline{v}$, and a relatively *hostile* DG_2 with valuation $\underline{v}$. In this extension, we instead allow voters to choose any DG_2 with common knowledge project valuation $v_D^2 \in [\underline{v}, \overline{v}]$. For simplicity, we set $w = 0$, i.e., consider parties that are purely policy-motivated. We impose structure on preferences that ensures that FG typically values the project by more than DG_2, and that there is sufficient variation in the domestic preference shock λ that the joint surplus of FG and DG_2 can become positive or negative:

Assumption A1: $\underline{v} < \overline{v} < v_F$, $v_F - s_1 > 0$, $\overline{v} + s_1 < 0$, $\sigma > v_F + \overline{v}$, $-\sigma < \underline{v} + s_1$.

Assumption A1 says that (1) on average, FG has a higher project valuation than friendly DG_1, and the relatively friendly DG_1 has a higher project valuation than the relatively hostile DG_1, (2) that FG has a net positive relative value of the project at date 1 at the initial terms s_1 while either DG_1 has a net negative relative value of the project at date 1 at the initial terms s_1; but (3) there is sufficient uncertainty about the common shock λ to domestic preferences, that (a) it could exceed the expected surplus from the project between FG and DG_2 with valuation $\overline{v}$ that is most friendly to the project; but, alternatively (b) it could be even less than expected value to DG_2 with valuation $\underline{v}$ that is most hostile to the project from participating at the initial status quo s_1. All other aspects of our model are unchanged. Note that the analysis of date-2 policy outcomes is unchanged from our base setting.

We initially assume that v_D^2 is exogenously drawn from cumulative distribution $G(v_D^2)$ on support $[\underline{v}, \overline{v}]$, reflecting a benchmark in which the election outcome is insensitive to the negotiation outcome. The expected lifetime payoff of a domestic agent with date-1 project valuation v is:

$$(1-\delta) r_1 (v + b_1) + \delta \int_{\underline{v}}^{\overline{v}} \int_{-\sigma}^{\sigma} r_2 (v + b_2 + \lambda)\, f(\lambda) d\lambda \, dG(v'),$$

where $f(\lambda)$ is the density of the domestic preference shock, λ. Here $r_1 \in \{0, 1\}$ is the date-1 domestic government's initial decision to implement the project ($r_1 = 1$) or not ($r_1 = 0$); and r_2 denotes the project outcome at date 2; and b_2 denotes the date-two transfer from FG when the project is implemented at date 2, i.e., when $r_2 = 1$. The analogous expected payoff of FG with project valuation v_F is:

$$(1-\delta) r_1 (v_F - b_1) + \delta \int_{\underline{v}}^{\overline{v}} \int_{-\sigma}^{\sigma} r_2 (v_F - b_2)\, f(\lambda) d\lambda \, dG(v').$$

By a direct extension of the date-2 analysis in the base setting, the expected date-2 payoff of a domestic agent with date-1 project valuation v is,

$$V_D(v,s_2)=\int_{\underline{v}}^{\overline{v}}\int_{-(v_D^2+s_2)}^{\sigma}(v+s_2+\lambda)f(\lambda)\,d\lambda\,dG(v_D^2)$$
$$+\int_{\underline{v}}^{\overline{v}}\int_{-(v_D^2+v_F)}^{-(v_D^2+s_2)}(v-v_D^2+\theta(v_D^2+\lambda+v_F))f(\lambda)\,d\lambda\,dG(v_D^2). \tag{A-1}$$

Likewise, the expected date-2 payoff of the foreign government FG with project valuation v_F given s_2 is

$$V_F(s_2)=\int_{\underline{v}}^{\overline{v}}\int_{-(v_D^2+s_2)}^{\sigma}(v_F-s_2)f(\lambda)\,d\lambda\,dG(v_D^2)$$
$$+\int_{\underline{v}}^{\overline{v}}(1-\theta)\int_{-(v_D^2+v_F)}^{-(v_D^2+s_2)}(v_D^2+\lambda+v_F)f(\lambda)\,d\lambda\,dG(v_D^2). \tag{A-2}$$

At date 1, FG makes an offer b_1 to the domestic government DG_1 with valuation v_D^1. DG_1 accepts the offer, i.e., $r_1(b_1)=1$, if and only if:

$$(1-\delta)(v_D^1+b_1)+\delta V_D(v_D^1,b_1)\geq\delta V_D(v_D^1,s_1). \tag{A-3}$$

Thus, FG's date-1 proposal solves:

$$\max_{b_1\geq s_1}\ (1-\delta)r_1(b_1)(v_F-b_1)+\delta V_F(r_1(b_1)b_1+(1-r_1(b_1))s_1),$$

subject to the participation constraint that $r_1(b_1)=1$ if (A-3) holds, and $r_1(b_1)=0$, otherwise. We now extend Proposition 1 to a setting with a continuum of possible DG_2 valuations. The proof, along with proofs of all results stated in this section, appears at the end of this section.

Proposition A1. When the identity of the date-2 domestic government does not depend on the date-1 agreement, the project is implemented at date 1 if and only if the date-1 surplus is positive, i.e., $v_D^1+v_F\geq 0$. Further, if the project is implemented at date 1, the foreign government extracts all surplus, offering the transfer that satisfies (A-3).

The intuition is precisely as in the base two-party setting: let $\Delta(v_D^1,s_2)$ be the ex-ante expected date-2 surplus from the perspective of the date-1 bargaining parties, for any status quo s_2:

$$\Delta(v_D^1,s_2)=V_D(v_D^1,s_2)+V_F(s_2)=\int_{\underline{v}}^{\overline{v}}\int_{-(v_D^2+v_F)}^{\sigma}(v_D^1+\lambda+v_F)f(\lambda)d\lambda\,dG(v_D^2). \tag{A-4}$$

When domestic power transitions are independent of the date-1 bargaining outcome, so too is the date-2 surplus; and its division represents a pure conflict of interest between FG and DG_1.

In particular, the total date-2 surplus arising from an agreement is no different than the surplus in the event of disagreement: for any $b_1 \geq 0$,

$$\Delta(v_D^1, b_1) - \Delta(v_D^1, s_1) = 0.$$

Thus, the total surplus from an agreement at date 1 is unrelated to the date-1 terms:

$$(1-\delta)(v_D^1 + v_F) + \Delta(v_D^1, b_1) - ((1-\delta)0 + \Delta(v_D^1, s_1)) = (1-\delta)(v_D^1 + v_F), \tag{A-5}$$

which implies once again that static and dynamic conditions for a date-1 agreement coincide.

Endogenous Power Transitions. We endogenize the date-2 domestic government DG_2 by having a pivotal domestic voter with project valuation v_{piv} (e.g., the median voter) select her most preferred representative, allowing the voter to choose any representative with valuation $v_D^2 \in [\underline{v}, \overline{v}]$, where the bounds $\underline{v}$ and $\overline{v}$ satisfy Assumption A1. This could reflect a setting with office-motivated parties that can commit to the pivotal voter's most-preferred platform.

When negotiating at date 1, the foreign and domestic governments may not perfectly know the pivotal voter's future preferences. We assume that, relative to the possible preferences of the domestic electorate, the set of available representatives is sufficiently large. We maintain the assumption that the pivotal voter's valuation is uniformly drawn on the interval $[v^e - \alpha, v^e + \alpha]$, imposing the following restriction on the support:

Assumption A2: (1) $v^e - \alpha - (v_F - s_1) > \underline{v}$ and (2) $v^e + \alpha < \overline{v}$.

In conjunction with Lemma A1, below, Assumption A2 ensures that the project valuation of the pivotal voter's preferred date-2 representative is contained in $(\underline{v}, \overline{v})$.

Let $V_D(v_{\text{piv}}, v_D^2, s_2)$ denote the domestic pivotal voter's expected date-2 payoff when (1) her project valuation is v_{piv}, (2) she appoints a date-2 domestic government DG_2 whose initial valuation is v_D^2, and (3) the status quo transfer is s_2:

$$V_D(v_{\text{piv}}, v_D^2, s_2) = \int_{-(v_D^2+s_2)}^{\sigma} (v_{\text{piv}} + s_2 + \lambda) f(\lambda)\, d\lambda + \int_{-(v_D^2+v_F)}^{-(v_D^2+s_2)} (v_{\text{piv}} - v_D^2 + \theta(v_D^2 + \lambda + v_F)) f(\lambda)\, d\lambda.$$

Given status quo agreement s_2, the pivotal voter's preferred date-1 representative solves:

$$\max_{v_D^2} V_D(v_{\text{piv}}, v_D^2, s_2).$$

With a uniform distribution over the preference shock, λ, the first-order condition yields:

Lemma A1. Given an inherited status quo agreement, $s_2 \geq s_1$, the domestic pivotal voter's preferred date-2 representative values the project by

$$v_D^2(s_2) = v_{\text{piv}} - (v_F - s_2). \tag{A-6}$$

This result also applies in our benchmark setting, but in that context voters are constrained to select between two parties. In the present setting, however, the pivotal voter is able to select her most preferred DG_2, which therefore varies smoothly with the first-period outcome s_2.

We showed that when power transitions are exogenous, total expected surplus is unaffected by the initial agreement. This is no longer true when date-1 outcomes alter the pivotal voter's preferred date-2 representative. To see why, recognize that from the perspective of the date-1 bargaining parties, the expected date-2 surplus derived from a status quo of s_2 is:

$$\begin{aligned}\Delta(v_D^1, s_2) &= \int_{v^e-\alpha}^{v^e+\alpha} \frac{1}{2\alpha} \int_{-v_D^2(s_2)-v_F}^{\sigma} (v_D^1 + \lambda + v_F) f(\lambda)\, d\lambda\, dv_{\text{piv}} \\ &= \int_{v^e-\alpha}^{v^e+\alpha} \frac{1}{2\alpha} \int_{-v_{\text{piv}}-s_2}^{\sigma} (v_D^1 + \lambda + v_F) f(\lambda)\, d\lambda\, dv_{\text{piv}}.\end{aligned}$$

In contrast to when the election outcome is unresponsive to date-1 negotiations, the surplus now indirectly depends on the negotiation outcome via its effect on the voter's future choice of representative. The *relative total date-2 surplus from an agreement* (versus no agreement) is:

$$\Delta(v_D^1, b_1) - \Delta(v_D^1, s_1) = \int_{v^e-\alpha}^{v^e+\alpha} \frac{1}{2\alpha} \int_{-v_D^2(b_1)-v_F}^{-v_D^2(s_1)-v_F} (v_D^1 + \lambda + v_F) f(\lambda)\, d\lambda\, dv_{\text{piv}}. \tag{A-7}$$

Our next lemma highlights how conflicts between DG_1, FG, and the domestic electorate determine the expected future value of date-1 agreements. Recall that v_{piv}^e denotes the expectation of the pivotal voter's future project valuation, from the perspective of the date-1 negotiating parties.

Lemma A2. The relative total date-2 surplus from an agreement is a single-peaked function of the date-1 transfer b_1, with unique maximum:

$$b^* \equiv v_D^1 + v_F - v^e. \tag{A-8}$$

To understand the result, note that the transfer b_1 that maximizes the expected date-2 surplus from an agreement, (A-7), equates the expected project valuation of DG_2 with that of DG_1. With uniform preference shocks, this transfer is b^*. It constitutes the expected date-2 surplus between the date-1 domestic and foreign governments—i.e., their static alignment—adjusted positively or negatively according to their degree of *joint* alignment relative to the domestic electorate. It reflects two distinct dynamic conflicts of interest that determine the effects of the date-1 outcome on expected date-2 surplus.

First, there is a dynamic conflict between FG and DG_1, since the date-1 transfer determines the division of date-2 surplus. FG prefers to secure DG_2's participation in the project with lower date-2 transfers, while the DG_1 wants its successor to secure higher transfers.

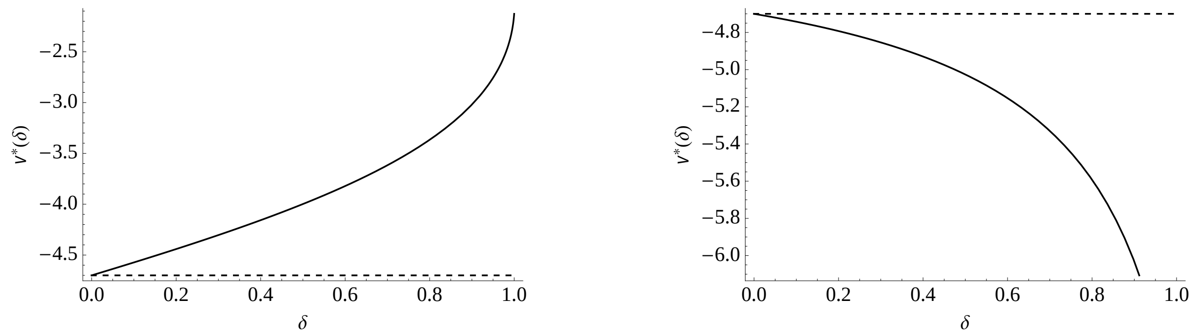
The date-1 transfer also determines the size of the expected date-2 surplus. This creates a *second* dynamic conflict between *both* governments and the domestic electorate. FG benefits from more generous agreements, which steer the electorate in favor of appointing a more pliant DG_2. This imperative becomes more urgent when the pivotal voter is expected to be more hostile, i.e., when v^e is lower, raising its willingness to make more generous transfers. In turn, DG_1's derived valuation of higher transfers depends on how it is aligned with the domestic electorate.

If DG_1 expects to view the project favorably relative to its electorate, i.e., if $v_D^1 - v^e$ is positive and large, this domestic mis-alignment *raises* the alignment between DG_1 and FG. In this case, *both* governments expect to gain from a larger transfer that steers voters toward a less hostile successor that is more likely to preserve the agreement when the date-1 negotiating parties want it to survive.

If, instead, DG_1 expects to be far more hostile to the project than its voters, i.e., if $v_D^1 - v^e$ is negative and large, the governments are in conflict over the attitude of the domestic government's successor. FG is less inclined to make generous offers, knowing that the electorate is already likely to appoint a more project-friendly successor. Moreover, DG_1 anticipates that higher offers will lead to a successor that is even more mis-aligned with its own interests. This is because a more project-friendly successor will be less effective in renegotiating revisions to the status quo, and will implement the project in circumstances where DG_1 would want to quit.

The scope for agreements to raise expected date-2 surplus thus hinges on the prospect that DG_1 may be replaced by a more hostile successor. If the date-1 negotiating parties are *aligned* relative to the electorate, the expected date-2 surplus from agreement increases relative to the date-1 surplus. In this case, a concern for date-2 outcomes may render agreement possible in settings where negotiations would otherwise have failed, i.e., when the static date-1 surplus is negative. If the date-1 governments are instead *mis-aligned* relative to the domestic electorate, the expected date-2 surplus from agreement *decreases* relative to the static surplus. In this case, a concern for date-2 outcomes may render agreement impossible in settings where negotiations would otherwise have succeeded, i.e., in settings where the static surplus is positive.

Proposition A2. There exists a threshold $v^*(v^e, \delta) < 0$, strictly increasing in the expected valua-



(a) $v^e = 4$

(b) $v^e = -4$

Figure 1 – Illustration of how the threshold $v^*(v^e, \delta)$ varies with δ. Parameters: $v_F = 4.7$, $\theta = .6$, $s_1 = 0$, $\sigma = 10$. The dashed line represents $v^*(v^e, 0) = -v_F$: if and only if $v_D^1 \geq v^*(v^e, 0)$, agents who are concerned only with date-1 outcomes will sign an agreement, implementing the project at date 2. In panel (a), more concern for the future *raises* conflict, while in panel (b), more concern for the future *lowers* conflict.

tion of the domestic pivotal voter, v^e, such that if and only if the date-one domestic government is not too hostile to the project, i.e., $v_D^1 \geq v^*(v^e, \delta)$, the foreign government's date-one transfer offer induces the domestic government to implement the project.

When the expected attitude of the domestic electorate becomes more favorable to the project, the induced conflict between FG and DG_1 grows. When δ rises, the consequences of current negotiations for future surplus weigh more heavily on the considerations of both negotiating governments. This may either raise or lower the conflict between them. Figure 1 illustrates two scenarios: one in which the pivotal voter is expected to view the project very favorably, and one in which she is expected to view the project very unfavorably. The dashed line indicates the valuation $v^*(v^e, 0) = -v_F$, the static valuation threshold for which the governments reach a date-1 agreement.

In panel (a), the pivotal voter is likely to be very positively inclined toward the project, and her desire to elect a friendly date-2 domestic government rises with increased transfers. Relative to their static conflict of interest, the dynamic conflict between FG and DG_1 sharpens, so when they weigh date-2 outcomes more heavily, the threshold $v^*(v^e, \delta)$ *rises*: concerns for future outcomes reduce prospects for date-1 agreement. In panel (b), the pivotal voter is expected to be very negatively inclined toward the project. FG is thus willing to make large concessions in order to steer the voter toward a successor DG_2 that will maintain the agreement. Relative to the static conflict of interest between FG and DG_1, their dynamic conflict softens: as the governments grow more concerned with date-2 outcomes, the threshold $v^*(v^e, \delta)$ *decreases*: a concern for future outcomes raises the prospects of a date-1 agreement, allowing even a statically mis-aligned FG and DG_1 to implement the joint project.[1]

Our benchmark showed that when election outcomes are unrelated to date-2 negotiations, DG_1 appropriates none of the expected discounted lifetime surplus from implementing the project. In contrast, we now show that if election outcomes are responsive to negotiation outcomes—if the support σ over domestic preference shocks λ is small enough that electoral outcomes hinge sensitively on b_1—and governments are sufficiently aligned, DG_1 may appropriate some of the surplus.

Proposition A3. When the support σ on domestic preference shocks λ is not too large, the pivotal voter's expected project valuation v^e is not too large, and agents place sufficient weight δ on date-two outcomes, there exists a threshold $v^{**}(v^e,\delta) \in (v^*(v^e,\delta),0)$ such that if $v_D^1 \in [v^*(v^e,\delta), v^{**}(v^e,\delta)]$, FG offers the smallest date-one transfer that induces DG_1 to implement the project; but if $v_D^1 > v^{**}(v^e,\delta)$, FG offers a strictly more generous date-one transfer than is necessary to induce DG_1 to implement it.

FG's preferred offer b_1^* solves:

$$-\delta \int_{v^e-\alpha}^{v^e+\alpha} \frac{1}{2\alpha}\theta(v_F - b_1^*)\frac{\partial}{\partial b_1}F(-v_D^2(b_1)-b_1)|_{b_1=b_1^*}\,dv_{\text{piv}} - \delta \int_{v^e-\alpha}^{v^e+\alpha} \frac{1}{2\alpha}(1-F(-v_D^2(b_1^*)-b_1^*))\,dv_{\text{piv}}$$
$$+\,\delta \int_{v^e-\alpha}^{v^e+\alpha} \frac{1}{2\alpha}(1-\theta)\int_{-v_D^2(b_1^*)-v_F}^{-v_D^2(b_1^*)-b_1^*} \left.\frac{\partial v_D^2(b_1)}{\partial b_1}\right|_{b_1=b_1^*} f(\lambda)\,d\lambda\,dv_{\text{piv}} \;=\; 1-\delta. \tag{A-9}$$

The left-hand side is the net date-2 marginal benefit of making a higher offer. The first term captures the impact of increasing the *extensive* margin: raising the promised future payment b_1 increases the prospect that the initial offer will not be renegotiated because the unanticipated preference shock λ now exceeds the expected renegotiation threshold of DG_2 with expected project valuation $v_D^2(b_1)$, $-v_D^2(b_1)-b_1$. The value to FG from a higher prospect of an agreement is its share of the surplus, $v_F - b_1^* > 0$. In the event of a subsequent (marginal) renegotiation, FG cares only about those circumstances in which DG_2 has the bargaining power (which occurs with probability θ) as there is a discontinuous jump in what DG_2 can extract if it can credibly walk away. This provides an incentive for FG to *raise* its initial offer.

The second term—the *intensive* margin—reflects that raising an initial offer lowers FG's future payoff whenever the date-1 agreement persists at date 2, which occurs whenever the unanticipated preference shock λ exceeds $-v_D^2 - b_1^*$. This intensive margin provides an incentive for

[1] The threshold $v^*(v^e,\delta)$ is not, in general, monotonic in δ.

FG to *hold back* from raising its initial offer.

The third term captures the change in FG's date-2 payoff when it holds future bargaining power (which occurs with probability $1-\theta$), and DG_2 is prepared to walk away at the inherited terms, but the surplus between the two governments is positive. Lemma revealed that more generous offers (i.e., higher b_1) diminish the pivotal domestic voter's desire to choose a representative who is more hostile to the project. FG values a more project-friendly DG_2 due to its less demanding participation constraint.

Finally, the right-hand side of (A-9) reflects the marginal cost of more generous offers, from FG's immediate (date-1) perspective. Substituting the uniform distribution, we re-write the optimal date-1 transfer offer as

$$b_1^* = \frac{\delta(v_F(2+\theta) - v^e + \sigma) - 2\sigma}{\delta(3+\theta)}. \tag{A-10}$$

The following is immediate.

Corollary A1. When the domestic pivotal voter is expected to be more opposed to the project, i.e., when v^e is more negative, or the probability θ that the date-2 domestic government will hold bargaining power is higher, the foreign government's optimal transfer b_1^* rises.

When the pivotal voter finds the project less attractive, so too will a future DG_2 (via a *lower* $v_D^2(b_1)$). This means that FG faces a greater risk of renegotiation at date two. Because raising the initial offer mitigates this risk by reducing the set of circumstances in which any DG_2 would wish to renegotiate, FG responds by offering more generous initial terms.

When DG_2 is more likely to hold bargaining power, FG's stakes from making a date-1 proposal that is unlikely to be renegotiated at date-2 rise—if DG_2 is prepared to walk away from the agreement, a higher θ raises the risk that she will appropriate the date-2 surplus. This induces FG to make more generous offers, to reduce the likelihood of renegotiation.

Comparison with Two-Party Benchmark: If voters can freely choose the project valuation of their date-2 government, the date-1 domestic government's acceptance decision and foreign government's offer determine (a) whether the date-2 domestic government is *more* or *less* hostile to the project than its predecessor, and (b) *how much* more or less hostile. Lemma A2 showed how the prospect of a date-2 government that is *more* hostile than the date-1 government is essential for larger transfers to increase the expected date-2 surplus between the parties, relative to the static surplus.

In contrast, with two-party competition, where parties cannot commit to platforms that they would not wish to implement, the hostile date-1 government can only be replaced by a strictly more project-friendly successor. Any change of power will therefore lead to a government that is both less likely to successfully renegotiate terms, and more willing to implement the project in cases where the hostile party wants to quit. This sharpens the conflict over election outcomes to the point where there is no prospect of a mutually advantageous transfer: *any* agreement that benefits the foreign government *must* harm the hostile domestic government, and vice-versa. Moreover, any benefit to either government is outweighed by the harm to the other. When there are only two political parties, what matters is not *how* much more the hostile party is opposed to the project than the friendly party: just that the hostile party *is more* opposed. These factors raise the risk that negotiations between the relatively hostile domestic government and the foreign government fail at date 1 even when the date-1 surplus from agreement is positive.

Proof of Proposition A1. We first verify necessary and sufficient conditions for the project to be implemented at date 1. DG_1's relative value of agreement,

$$(1-\delta)(v_D^1+b_1)+\delta(V_D(v_D^1,b_1)-V_D(v_D^1,s_1)) \tag{A-11}$$

is convex in b_1; $\delta \in [0,1)$, and $v_D^1+s_1<0$ implies there is at most one $b_D(v_D^1) \in (s_1, v_F]$ such that DG_1's relative value of agreement is positive if and only if $b_1 \geq b_D(v_D^1)$. By a similar argument, it can be shown that there exists $b_F \leq v_F$ such that FG's relative value of agreement is positive if and only if $b_1 \leq b_F$; therefore, a necessary and sufficient condition for a date-1 agreement is $b_D(v_D^1) \leq b_F$, which is equivalent to $v_F+v_D^1 \geq 0$. This proves the first claim. We next show that if $v_D^1+v_F \geq 0$, FG appropriates the total relative surplus from an agreement. Fix DG_1's strategy $r_1(b_1)=1$ if and only if $b_1 \geq b_D$. FG prefers to make an offer $b_1 > b_D(v_D^1)$ if and only if

$$(1-\delta)(v_F-b_1)+\delta V_F(b_1) \ \geq \ (1-\delta)(v_F+v_D^1)+\delta V_F(s_1), \tag{A-12}$$

while $b_1 > b_D(v_D^1)$ implies that DG_1 strictly prefers to accept:

$$(1-\delta)(v_D^1+b_1)+\delta V_D(v_D^1,b_1) \ > \ \delta V_D(v_D^1,s_1). \tag{A-13}$$

Letting $\Delta(v_D^1)=\int_{\underline{v}}^{\overline{v}}\int_{-(v_D^2+v_F)}^{\sigma}(v_D^1+\lambda+v_F)f(\lambda)\,d\lambda\,dG(v_D^2)$, (A-13) can be written $(1-\delta)(v_D^1+b_1)+\delta\Delta(v_D^1)-\delta V_F(b_1) > \delta\Delta(v_D^1)-\delta V_F(s_1)$. Combining this with (A-12) yields $\delta(V_F(b_1)-V_F(s_1)) < (1-\delta)(v_D^1+b_1) \leq \delta(V_F(b_1)-V_F(s_1))$, a contradiction. □

Proof of Lemma A1. Immediate after substituting $\lambda \sim U[-\sigma,\sigma]$. □

Proof of Proposition A2. The expected date-2 payoff to DG_1 with valuation v_D^1 is:

$$V_D(v_D^1,s_2) \ = \int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}\int_{-(v_D^2(s_2)+s_2)}^{\sigma}(v+\lambda+s_2)f(\lambda)\,d\lambda\,dv_{\text{piv}} \tag{A-14}$$

$$+\int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}\int_{-(v_D^2(s_2)+v_F)}^{-(v_D^2(s_2)+s_2)}(v-v_D^2(s_2)+\theta(v_D^2(s_2)+\lambda+v_F))f(\lambda)\,d\lambda\,dv_{\text{piv}}.$$

DG_1 prefers $r_1(b_1)=1$ if and only if $(1-\delta)(v_D^1+b_1)+\delta V_D(v_D^1,b_1)-\delta V_D(v_D^1,s_2)\geq 0$, where this relative value is: (i) convex in b_1, (ii) strictly negative evaluated at $b_1=0$ for $\delta\in[0,1)$, (iii) strictly increasing in v_D^1 and (iv) constant in v^e. Thus, there is at most one $b_D(v_D^1,\delta)\in(0,v_F]$ such that this relative value is weakly positive if and only if $b_1\geq b_D$. Likewise, the expected date-2 payoff to FG from standing offer s_2 is:

$$\begin{aligned} V_F(s_2) \; &= \int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}\int_{-(v_D^1(s_2)+s_2)}^{\sigma}(v_F-s_2)f(\lambda)\,d\lambda\,dv_{\text{piv}} \\ &+\int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}(1-\theta)\int_{-(v_D^1(s_2)+v_F)}^{-(v_D^1(s_2)+s_2)}(v_F+v_D^1(s_2)+\lambda)f(\lambda)\,d\lambda\,dv_{\text{piv}}. \end{aligned} \tag{A-15}$$

If $r_1(b_1)=1$, the foreign government's date-1 relative value of agreement is $(1-\delta)(v_F-b_1)+\delta(V_F(b_1)-V_F(s_1))$, where this value is (v) concave in b_1, (vi) strictly positive evaluated at $b_1=s_1$, (vii) weakly negative evaluated at $b_1=v_F$, (viii) strictly decreases in $v^e\equiv\mathbb{E}[v_{\text{piv}}]$, and (ix) constant in v_D^1. We conclude that there exists $b_F(v^e,\delta)\in(s_1,v_F]$, such FG's relative value of agreement is positive if and only if $b_1\leq b_F$. Combining (iii), (ix), $b_D(\min\{\frac{1}{2}v_F\theta-\sigma,-v_F\},\delta)\geq v_F\geq b_F(v^e,\delta)$, and (by straightforward algebra) $b_D(-s_1,\delta)<b_F(v^e,\delta)$ yields $v^*(\delta,v^e)<0$ such that $b_D(v_D^1,\delta)\leq b_F(v^e,\delta)$ if and only if $v_D^1\geq v^*$, where $v^*(\delta,v^e)$ *increases* in v^e by (iv) and (viii).

We now prove the second part. Let b_1^* denote FG's most-preferred date-1 transfer b_1, i.e., expression (A-10). b_1^* strictly increases in δ and $b_1^*>0$ if and only if $\delta>\delta^*\equiv\frac{2\sigma}{v_F(2+\theta)+\sigma-v^e-s_1(3+\theta)}$, where $\delta^*<1$ if and only if $\sigma<v_F(1+\theta)-s_1(3+\theta)+v_F-v^e\equiv\hat{\sigma}$. Suppose, then, $\sigma<\hat{\sigma}$. DG_1's expected relative payoff from choosing $r_1(b_1^*)=1$ is continuous and strictly increasing in v_D^1; evaluated at $v_D^1=-s_1$, its expected relative payoff is $(1-\delta)(-s_1+b_1^*)+\delta(V_D(-s_1,b_1^*)-V_D(-s_1,-s_1))$, which is strictly concave in δ; straightforward algebra yields two roots: δ^* and $\delta'>\delta^*$. We have shown $\sigma<\hat{\sigma}$ implies $\delta^*<1$. We have $\delta'\geq 1$ if $v^e\leq\frac{s_1\theta(\theta+3)-v_F\left(\theta^2+4\theta+2\right)+\sigma(\theta+4)}{\theta+2}$. When these conditions hold, $\delta>\delta^*$ implies that $b^*(\delta)$ is offered by FG and accepted by DG_1. $\square$

B. Domestic Pivotal Voter May Benefit From Limited Choice. We compare the domestic pivotal voter's payoffs in negotiation outcomes in two settings—one in which she can choose any date-2 representative, as in the previous Supplemental Appendix A, and one in which she is forced to select *either* the friendly party (with valuation $\overline{v}$) *or* the hostile party (with valuation $\underline{v}$), as in our benchmark presentation. We show how the pivotal voter may benefit from being constrained. We suppose that the pivotal voter at date 1 has project valuation v^e, and anticipates that her interim valuation (between dates 1 and 2) is v_{piv}, drawn uniformly from $[v^e - \alpha, v^e + \alpha]$. We evaluate her date-1 (total discounted) expected payoffs.[2] To fix ideas, suppose the date-1 domestic government has project valuation $\overline{v}$, and we set $w = 0$.

When the pivotal voter may freely select her date-2 representative, the previous section of this Supplemental Appendix showed that her most-preferred representative solves:

$$\max_{v_D^2 \in \mathbb{R}} V(v_{\text{piv}}, v_D^2, s_2) \tag{A-16}$$

where

$$V(v, v_D^2, s_2) = \int_{-(v_D^2+s_2)}^{\sigma} (v + \lambda + s_2) f(\lambda)\, d\lambda + \int_{-(v_D^2+v_F)}^{-(v_D^2+s_2)} (v - v_D^2 + \theta(v_D^2 + \lambda + v_F)) f(\lambda)\, d\lambda.$$

We learn from Lemma that the unique solution to (A-16) is:

$$\hat{v}(s_2) = v_{\text{piv}} - (v_F - s_2). \tag{A-17}$$

By contrast, when the pivotal voter must choose between the friendly and hostile party, her most-preferred date-2 representative solves

$$\max_{v_D^2 \in \{\underline{v}, \overline{v}\}} V(v_{\text{piv}}, v_D^2, s_2). \tag{A-18}$$

Thus the pivotal voter votes for the hostile party if and only if

$$v_{\text{piv}} \leq \frac{\underline{v} + \overline{v}}{2} + (v_F - s_2). \tag{A-19}$$

Suppose that parameters are such that, in both settings, DG_1 with valuation $\overline{v}$ and FG implement the project at a transfer b_1 that satisfies DG_1's participation constraint (we will verify that this is true for the example). Let b_1^{NC} denote the transfer when the pivotal voter freely selects

[2] An alternative approach would be to evaluate the welfare of a date-1 voter that is distinct from the pivotal voter in between dates 1 and 2. This approach yields qualitatively similar results.

her date-1 representative ("No Constraint"). Thus, b_1^{NC} solves

$$(1-\delta)(\overline{v}+b_1^{NC})+\delta\int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}V_D(\overline{v},v_{\text{piv}}-(v_F-b_1^{NC}),b_1^{NC})\,dv_{\text{piv}}=\delta\int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}V_D(\overline{v},v_{\text{piv}}-v_F,s_1)\,dv_{\text{piv}}.$$

With constrained choice between two parties, the transfer b_1 that solves the date-1 domestic government's participation constraint, b_1^C ("Constraint") solves:

$$\begin{aligned}
&(1-\delta)(\overline{v}+b_1^C)+\delta\int_{v^e-\alpha}^{\frac{\underline{v}+\overline{v}}{2}+v_F-b_1^C}\frac{1}{2\alpha}V_D(\overline{v},\underline{v},b_1^C)\,dv_{\text{piv}}+\delta\int_{\frac{\underline{v}+\overline{v}}{2}+v_F-b_1^C}^{v^e+\alpha}\frac{1}{2\alpha}V_D(\overline{v},\overline{v},b_1^C)\,dv_{\text{piv}}\\
=\;&(1-\delta)0\qquad\quad+\delta\int_{v^e-\alpha}^{\frac{\underline{v}+\overline{v}}{2}+v_F-s_1}\frac{1}{2\alpha}V_D(\overline{v},\underline{v},s_1)\,dv_{\text{piv}}+\delta\int_{\frac{\underline{v}+\overline{v}}{2}+v_F-s_1}^{v^e+\alpha}\frac{1}{2\alpha}V_D(\overline{v},\overline{v},s_1)\,dv_{\text{piv}}.
\end{aligned}\tag{A-20}$$

The domestic pivotal voter's date-1 expected payoff in the setting with no constraints on her choice of date-2 representative is therefore:

$$(1-\delta)(v^e+b_1^{NC})+\delta\int_{v^e-\alpha}^{v^e+\alpha}\frac{1}{2\alpha}V_D(v_{\text{piv}},v_{\text{piv}}-(v_F-b_1^{NC}),b_1^{NC})\,dv_{\text{piv}},\tag{A-21}$$

while her corresponding payoff in the setting with constrained choice is:

$$(1-\delta)(v^e+b_1^C)+\delta\int_{v^e-\alpha}^{\frac{\underline{v}+\overline{v}}{2}+v_F-b_1^C}\frac{1}{2\alpha}V_D(v_{\text{piv}},\underline{v},b_1^C)\,dv_{\text{piv}}+\delta\int_{\frac{\underline{v}+\overline{v}}{2}+v_F-b_1^C}^{v^e+\alpha}\frac{1}{2\alpha}V_D(v_{\text{piv}},\overline{v},b_1^C)\,dv_{\text{piv}}.\tag{A-22}$$

Expression (A-22) is greater than (A-21) if and only if:

$$\begin{aligned}
b_1^C-b_1^{NC}\;\geq\;&\frac{\delta}{1-\delta}\int_{v^e-\alpha}^{\frac{\underline{v}+\overline{v}}{2}+v_F-b_1^C}\frac{1}{2\alpha}\Big(V_D(v_{\text{piv}},v_{\text{piv}}-(v_F-b_1^{NC}),b_1^{NC})-V_D(v_{\text{piv}},\underline{v},b_1^C)\Big)\,dv_{\text{piv}}\\
+\;&\frac{\delta}{1-\delta}\int_{\frac{\underline{v}+\overline{v}}{2}+v_F-b_1^C}^{v^e+\alpha}\frac{1}{2\alpha}\Big(V_D(v_{\text{piv}},v_{\text{piv}}-(v_F-b_1^{NC}),b_1^{NC})-V_D(v_{\text{piv}},\overline{v},b_1^C)\Big)\,dv_{\text{piv}}.
\end{aligned}\tag{A-23}$$

If the transfers across each setting were the same, i.e., $b_1^C=b_1^{NC}$, the inequality is never satisfied: the voter simply sacrifices the flexibility to fine-tune her choice of date-2 representative. More generally, the domestic voter expects to benefit only if the transfer b_1^C is sufficiently large relative to b_1^{NC} to compensate for her diminished flexibility in appointing the date-2 representative. This transfer b_1^C can exceed b_1^{NC} because the foreign government recognizes an increased threat of facing a very hostile date-2 government—even if a moderate voter would prefer to elect only a modestly hostile date-2 government, the lack of choice may force her to 'overshoot' in favor of a far more hostile representative. This, in turn, acts as a source of discipline on date-1 negotiations, from which the pivotal voter may expect to benefit.

We now illustrate conditions under which (A-23) holds for a set of benchmark parameters. We fix $v_F = 4$, $\sigma = 8.3$, $\theta = 1$, $\delta = .7$, $\underline{v} = -6$, $s_1 = 0$, and $\alpha = 2.5$, leaving v^e and $\overline{v}$ as free parameters. The shaded area of Figure 2 identifies pairs $(v^e, \overline{v})$ for which the inequality (A-23) is satisfied.

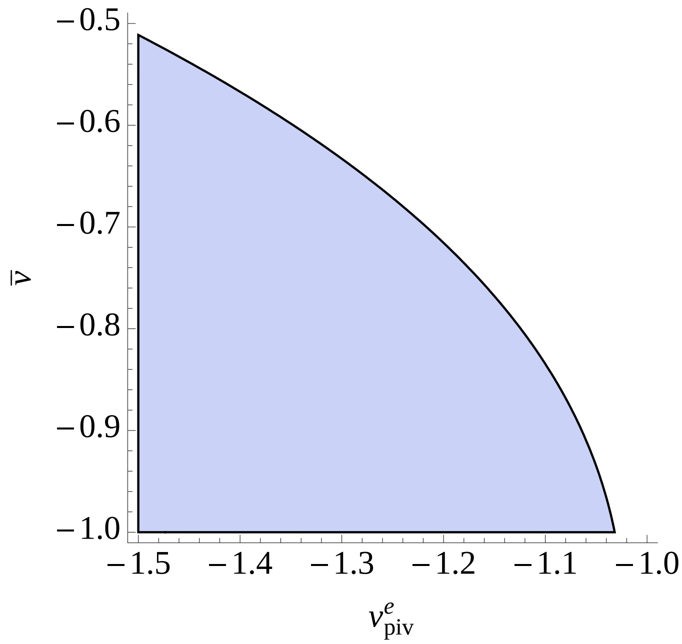


Figure 2 – The shaded area denotes pairs $(v^e, \overline{v})$ such that domestic pivotal voter prefers a system of limited choice, i.e., expression (A-23) holds. Parameters: $\delta = .7$, $v_F = 4$, $\theta = 1$, $\sigma = 8.3$, $\underline{v} = -6$, $s_1 = 0$, and $\alpha = 2.5$.

Fixing the project valuation of the friendly party $\overline{v}$, i.e., DG_1, the pivotal voter is more likely to prefer a system of limited choice when she is relatively more hostile, i.e., when v^e is lower. A more hostile pivotal voter can more credibly threaten to revert from the friendly party to the hostile party, even though the hostile party may be significantly more opposed to the project than the pivotal voter's most preferred representative. This exerts discipline on FG's initial offer, raising its date-1 transfer.

Fixing the pivotal voter's date-1 (and anticipated date-2) valuation v^e, the pivotal voter is also more likely to prefer a system of limited choice when the friendly party values the project by less, i.e., when $\overline{v}$ is more negative. To see why, consider a friendly DG_1's decision to accept or reject an offer from FG in the two-party setting. When $\overline{v}$ is large relative to $\underline{v}$, the friendly party—like FG—is concerned that the hostile party will win office. This makes the friendly party more willing to accept less generous offers, because it is more likely to retain office on the basis of *any* status quo transfer b_1 than a status quo of zero. Anticipating this, FG makes worse offers, from which the pivotal voter suffers. When, instead, the friendly party is more hostile—i.e., when $\overline{v}$ is lower—its bargaining position is strengthened by its increased intrinsic congruence with its potential replacement. This forces FG to extend more generous transfers in order to induce the date-1 friendly government's participation in the project.

C. Retrospective Voters. With forward-looking voters, their induced preferences over representatives at the end of date 1 reflect their assessments of which party will best serve their interests at date 2. This creates a *commitment problem*: voters cannot credibly promise to reward a date-1 incumbent for securing better transfers at date 1. This problem is especially severe for an incumbent who is fundamentally opposed to the project: under prospective voting, securing more generous concessions in return for implementing the project at date 1 unambiguously *harms* its prospect of being returned to office at date 1.

Suppose, instead, that voters are retrospective: they reward or punish incumbents based solely on their date-1 payoffs. To highlight the consequences of this behavior, we suppose that a pivotal domestic voter with valuation v_{piv} uniformly drawn on $[v^e-\alpha, v^e+\alpha]$ reelects the date-1 incumbent according to a reward schedule that is linear and increasing in her date-1 payoff:

$$R(r_1(v_{\text{piv}}+b_1)) = \max\{0, \min\{a+\beta r_1(v_{\text{piv}}+b_1), 1\}\},$$

where $a, \beta \geq 0$, and as before $r_1 \in \{0,1\}$ is the indicator taking the value 1 if the date-1 project is implemented. We assume $v^e + v_F > 0$, and to avoid unedifying cases, we scale a and $\beta > 0$ so that $a + \beta v^e > 0$ and $a + \beta(v^e + v_F) < 1$. The parameter β captures the salience of the international negotiation in the domestic elections. For simplicity, we fix $s_1 = 0$, so that $s_2 = r_1 b_1$. FG's offer to a date-1 domestic government with valuation $v \in \{\underline{v}, \overline{v}\}$ solves:

$$\begin{aligned}\max_{b_1\geq 0}\ (1-\delta)r_1(b_1)(v_F-b_1) &+ \delta R(r_1(v^e+b_1))V_F(v, b_1 r_1(b_1)) \\ &+ \delta(1-R(r_1(v^e+b_1)))V_F(v', b_1 r_1(b_1)),\end{aligned} \tag{A-24}$$

subject to the date-1 domestic government's participation constraint that $r_1(b_1) = 1$ if and only if:

$$\begin{aligned}(1-\delta)(v_D^1+b_1) + \delta R(v^e+b_1)[V_D(v_D^1, v, b_1)+w] &+ (1-R(v^e+b_1))V_D(v_D^1, v', b_1) \\ \geq \delta R(0)[V_D(v_D^1, v, 0)+w] &+ (1-R(0))V_D(v_D^1, v', 0),\end{aligned} \tag{A-25}$$

where v' is the valuation of the party that does *not* hold date-1 domestic power. We establish an analogue to Proposition 2, providing conditions under which a hostile incumbent either fails to secure an initial agreement, or is instead held to its participation constraint.

Proposition C1. Consider *retrospective voting* and suppose that the *hostile* party holds domestic office at date 1. Then, for any $\delta > 0$, if international negotiations are sufficiently salient in the election and the parties are sufficiently polarized in the sense that

$$\beta(\overline{v} - \underline{v}) > \frac{1+\theta}{2}, \tag{A-26}$$

then either (1) no agreement is signed, or (2) the agreement is the smallest that secures the hostile government's participation, i.e., satisfies (A-25).

If voters are *forward*-looking, the primary obstacle to an agreement between a foreign government and a hostile domestic incumbent is the electoral interest of the hostile incumbent: securing a more generous agreement raises the prospect that a hostile government is subsequently replaced with a friendly government. So, even in settings where the foreign government would be prepared to make positive—and possibly large—transfers, the hostile domestic government would prefer to reject these offers.

In contrast, if voters are *backward*-looking, the primary obstacle to an agreement between a foreign government and a hostile domestic incumbent is the induced electoral interest of the foreign government: more generous offers now *raise* the prospect that a hostile date-1 incumbent retains power. Less generous offers worsen the payoff of the pivotal domestic voter, who punishes the incumbent with replacement. This incentivizes FG to hold back from offering higher transfers in exchange for an initial agreement. The conflict of interest between FG and a hostile domestic incumbent grows as (1) the election outcome becomes more responsive to date-1 outcomes (i.e., β increases) and (2) FG's value from ensuring the fall of the incumbent rises (i.e., $\overline{v} - \underline{v}$ rises).

Thus, the conflict of interest between the foreign government and the hostile party is fundamental, and does not hinge on the farsightedness of the electorate.

Suppose, instead, that DG_1 is friendly. With forward-looking voters, more generous initial agreements help the friendly incumbent to remain in power, since voters' induced preferences over date-2 negotiators revert in favor of maintaining the agreement, rather than improving it. With retrospective voting, more generous initial agreements help the friendly incumbent to remain in power. This raises the stakes for FG, encouraging it to make relatively more generous offers to the friendly incumbent than it would prefer to make to a hostile government. In contrast to settings with prospective voters, a friendly domestic incumbent government may secure more generous initial terms than a hostile incumbent under retrospective voting.

Corollary C1. For any $\delta > 0$, if $\beta(\overline{v} - \underline{v}) > \frac{1+\theta}{2}$, there exists $\overline{w}$ such that if $w > \overline{w}$ (office-holding motives are sufficiently strong), a date-1 friendly government that derives a strictly positive surplus from the foreign government's initial offer extracts strictly higher transfers from the foreign government than would be obtained by a hostile domestic government.

When the election outcome is responsive to the date-1 outcome, the *conflict* between the foreign government and a hostile domestic government increases. So, too, the *congruence* between the foreign government and the friendly domestic government increases. In order to promote the reelection of a friendly government, the foreign government makes strictly more generous offers than it would make to a hostile government.

When $\beta(\overline{v} - \underline{v}) > \frac{1+\theta}{2}$, any agreement between FG and hostile DG_1 involves the smallest possible transfer that induces the hostile government's participation. With retrospective voting, DG_1 enjoys a higher prospect of reelection whenever the transfer from the foreign government gives the (expected) pivotal voter a strictly higher value from the project than from no project, i.e., $v^e + b_1 > 0$. In contrast with prospective voting, this is true regardless of the identity of DG_1. As office-holding motives become overwhelmingly important for the domestic political parties, they become more willing to accept any agreement that increases their chances of reelection, which implies that their participation constraints converge. Thus, when $w > 0$ is sufficiently large, whenever the friendly government receives a strictly positive rent, i.e., a transfer that strictly exceeds the minimum required to induce its participation (note: FG's objective is strictly concave, and an interior solution does not depend on w), a hostile DG_1 that secures only that needed to induce its participation must receive a less generous offer. And since FG values the reelection of friendly DG_1—which is achieved with larger offers—there are primitives for which its most preferred offer is strictly larger than that needed to secure the friendly government's participation. Note that the conditions in the Corollary are sufficient, but not necessary, for the friendly party to secure a higher transfer.

Proof of Proposition C1. When (A-26) holds, straightforward algebra establishes that FG's relative value of agreement at date-1 with transfer b_1 is strictly convex in b_1, strictly positive evaluated at $b_1 = 0$, and strictly negative evaluated at $b_1 = v_F$. Hence, there is a unique $b_F > 0$ such that the foreign government's relative value of agreement at date-1 with transfer b_1 is weakly positive if and only if $b_1 \leq b_F$. Turning to hostile DG_1's participation constraint, straightforward algebra establishes that under condition (A-26), the LHS of (A-25) evaluated at $v_D^1 = \underline{v}$ is strictly negative evaluated at $b_1 = 0$ and strictly concave in b_1. Moreover, its partial derivative with respect to b_1 is:

$$(1-\delta) + \delta \frac{\partial}{\partial b_1} R(v^e + b_1)(w + V_D(\underline{v}, \underline{v}, b_1) - V_D(\underline{v}, \overline{v}, b_1)) + R(v^e + b_1)\frac{\partial}{\partial b_1} V_D(\underline{v}, \underline{v}, b_1) + (1 - R(v^e + b_1))\frac{\partial}{\partial b_1} V_D(\underline{v}, \overline{v}, b_1). \tag{A-27}$$

Substituting in $\sigma \sim U[-\sigma, \sigma]$, we find that this expression is strictly positive evaluated at $b_1 = v_F$ if $\underline{v} + v_F + \sigma > 0$, which holds under Assumption 3, so that the difference of the LHS and RHS of (A-25) strictly increases in $b_1 \in [0, v_F]$. We conclude that there exists at most one threshold $b_D(\underline{v}, w) \in (0, v_F)$ such that (A-26) is satisfied if and only if $b_1 \geq b_D(\underline{v}, w)$. Thus, $b_D(\underline{v}, w) > b_F$ implies no agreement is signed at date 1. If, instead, $b_D(\underline{v}, w) \leq b_F$, FG strictly prefers the offer b_F, since its payoff strictly decreases in $b_1 \in [0, b_F]$. $\square$

Proof of Corollary C1. By the previous proposition, if $\beta(\overline{v} - \underline{v}) > \frac{1+\theta}{2}$, and an agreement is reached with hostile DG_1, it is the smallest offer that satisfies hostile DG_1's participation constraint, i.e., $b_D(\underline{v}, w)$. It is easy to verify that (1) $\lim_{w \to \infty} |b_D(\overline{v}, w) - b_D(\underline{v}, w)| = 0$, where $b_D(\overline{v}, w)$ is the corresponding transfer that solves friendly DG_1's participation constraint, and (2) FG's objective (A-24) evaluated at $v = \overline{v}$ and $v' = \underline{v}$ is strictly concave in b_1. Thus, if w is sufficiently large, then a transfer $b^*(\overline{v})$ that solves the associated first-order condition and further yields a positive surplus to friendly DG_1, i.e., satisfies $b^*(\overline{v}) > b_1^D(\overline{v}, w)$, also satisfies $b^*(\overline{v}) > b_1^D(\underline{v}, w)$. $\square$

D. Domestic Politics and Prospects for Long-Term Agreements. In our core, two-party setting, suppose that the hostile party grows less opposed to the project in the sense that $\underline{v}$ increases. Does this imply that the prospect of a successful negotiation at the (terminal) date 2 increases? We now show that the answer may be *no*, by way of an example.

The probability that the project is implemented at date 2 given status quo offer $b_1 \geq s_1$ is:

$$\Pr(v^{\text{med}} \leq \hat{v}(b_1))(1 - F(-(\underline{v} + v_F))) + \Pr(v^{\text{med}} > \hat{v}(b_1))(1 - F(-(\overline{v} + v_F)). \tag{A-28}$$

If $v^{\text{med}} \leq \hat{v}(b_1)$, the pivotal voter wants to elect the party that is hostile. The project will then be implemented so long as the date-2 surplus is positive, i.e., as long as $\underline{v} + \lambda + v_F \geq 0$, which occurs with probability $1 - F(-(\underline{v} + v_F))$. If, instead, $v^{\text{med}} > \hat{v}(b_1)$, the pivotal voter wants to elect the party that is friendly to the project, in which case the project will be implemented so long as $\overline{v} + \lambda + v_F \geq 0$, which occurs with probability $1 - F(-(\overline{v} + v_F))$.

Conditional on the identity of the date-2 domestic government, the transfer b_1 does not affect whether the project is implemented. This is because implementation only depends on whether the realized date-2 joint surplus is positive and not on the status quo transfer.

This transfer, nonetheless, has an indirect impact on date-2 outcomes via its impact on whether the hostile or friendly party is elected. In turn, changes in primitives such as the ideologies of the domestic political parties exert both direct and indirect effects on the prospects of a date-1 project. The *direct* effects arise from changes in how each party behaves in office, conditional on being elected. The *indirect* effects arise from changes in the foreign government's incentives that determine its initial date-1 proposal, and any effects on the pivotal voter's subsequent electoral choice.

Suppose that DG_1 is friendly, and that the initial offer, b_1^*, satisfies the first-order condition associated with FG's objective function, and suppose $r_1(b_1^*) = 1$. Let $P(\hat{v}(b_1)) = \Pr(v^{\text{med}} \leq \hat{v}(b_1))$ denote the probability that the hostile party is elected in between dates 1 and 2, given standing offer b_1. The derivative of the probability of a date-2 agreement (A-28) with respect to $\underline{v}$ is:

$$\begin{aligned} &P(\hat{v}(b_1^*))f(-(\underline{v} + v_F)) \\ &\qquad - \left.\frac{\partial P(\hat{v})}{\partial \hat{v}}\right|_{\hat{v}=\hat{v}(b_1^*)} \left(\frac{\partial \hat{v}(b_1^*)}{\partial \underline{v}} + \left.\frac{\partial \hat{v}(b_1)}{\partial b}\right|_{b_1 = b_1^*} \frac{db_1^*}{d\underline{v}} \right) (F(-(\underline{v} + v_F)) - F(-(\overline{v} + v_F))). \end{aligned} \tag{A-29}$$

The first component represents the *direct* effect of a moderation by the hostile party. With probability $P(\hat{v}(b_1^*))$, the hostile party holds office at date 1. For a fixed prospect that it holds power,

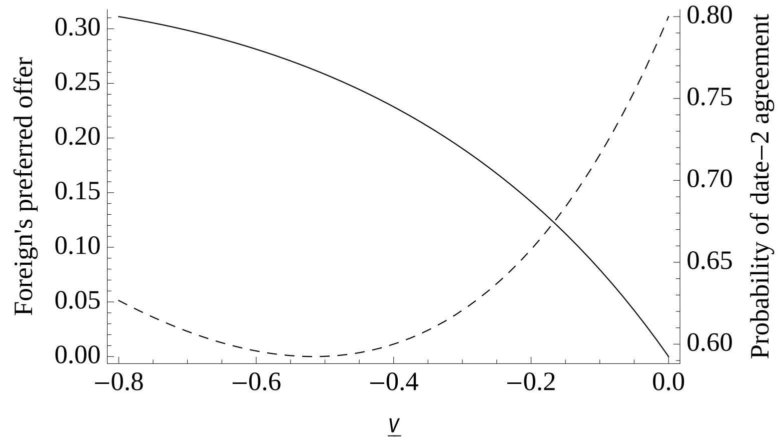


Figure 3 – How the probability of a date-2 agreement changes when the *hostile* party becomes more favorable to reform. Parameters are: $\overline{v} = 0$, $\sigma = .8$, $v_F = .8$, $v^e = .3$, $\delta = 1$, $\theta = 1$, $w = 1$, $s_1 = 0$ and $\alpha = \frac{1}{2}$.

a higher $\underline{v}$ *raises* the prospect of an agreement by expanding the set of circumstances in which the date-2 bargaining surplus between FG and DG_2 is positive, i.e., $v_F + \underline{v} + \lambda \geq 0$. The second part of the expression captures two *indirect* effects, each of which operates via its consequences for the relative prospect that the hostile party holds political power at date 2.

First, when the hostile party becomes more favorably disposed to the project—i.e., when $\underline{v}$ increases—the hostile party becomes more electorally competitive, since it has moved closer to the friendly party, capturing some of its voters. This is captured by the term $\frac{\partial \hat{v}(b_1^*)}{\partial \underline{v}} = \frac{1}{2}$, implying that the identity of the voter who is indifferent between the friendly and hostile parties, $\hat{v}$, shifts upward. Second, as Proposition 5 established, the foreign government's preferred offer changes. If its preferred offer falls, this further advantages the hostile party, electorally, by rendering it relatively valuable as an instrument for achieving more future concessions, since $\frac{\partial \hat{v}(b_1)}{\partial b_1} < 0$. Even a higher offer from the foreign government may not be enough to outweigh the direct loss of domestic electoral competitiveness suffered by the friendly party.

With uniform uncertainty over the domestic preference shock (λ) and the pivotal voter (v^{med}), (A-29) simplifies to

$$\frac{1}{(2\alpha)(2\sigma)}\left(\hat{v}(b_1^*) - (v^e - \alpha) - \left(\frac{1}{2} - \frac{db_1^*}{d\underline{v}}\right)(\overline{v} - \underline{v})\right).$$

The indirect effects that push in favor of a reduced prospect that the project is implemented at date 2 are more likely to dominate when the hostile party is initially on the electoral fringe, i.e., when $P(\hat{v}(b_1^*))$ is small. In turn, this is more likely when (1) the gap $\overline{v} - \underline{v}$ is large and (2) v^e is not too negative. A higher $\overline{v} - \underline{v}$ incentivizes the foreign government to make more generous offers, raising b_1^* and thus lowering $P(\hat{v}(b_1^*))$, while a more pro-project anticipated pivotal voter is primitively more aligned with the friendly party.

Figure 3 illustrates how these effects may resolve: when the hostile party is initially very opposed to the project relative to expected public opinion, it is also electorally marginal. Then, a moderation of its position first works via its improved electoral prospects to *reduce* the prospect of a date-2 agreement. Eventually, though, increased softening of the hostile party's stance *raises* the prospect of agreement via its impact when the hostile party wins office. A related result can obtain for changes in the friendly party's preferences: raising its already relatively favorable attitude toward the project ($\overline{v}$) may *reduce* the prospect of a long-term agreement by pushing voters toward the hostile party, raising the prospect that the hostile party holds office.

E. Domestic Government Holds Date-1 Bargaining Power. In our benchmark presentation, we assume that at date 1 the foreign government is the *proposer* and the domestic government is the *receiver*. We now show how results change if, instead, DG_1 is the proposer.

Exogenous Transitions. Consider, first, the setting in which the identity of the date-2 domestic government does not depend on the date-1 negotiation outcome.

Proposition E1. (*Domestic Government Makes Date-1 Offer*). When the identity of the date-2 domestic representative does not depend on the date-1 agreement, the project is implemented at date 1 if and only if the date- surplus is positive, i.e., $v_D^1 + v_F \geq 0$. Further, if the project is implemented at date 1, the domestic government extracts all surplus.

Proof of Proposition E1. The case $\delta = 0$ is trivial. Consider, instead, $\delta > 0$. DG_1's relative value from an agreement with transfer b_1 is

$$\begin{aligned}(1-\delta)(v_D^1 + b_1) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} &\Pr(v_D^2)\Big[\mathbf{1}[v_D^2 = v_D^1]w + V_D(v_D^1, v_D^2, b_1)\Big] \\ -(1-\delta)0 \qquad - \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} &\Pr(v_D^2)\Big[\mathbf{1}[v_D^2 = v_D^1]w + V_D(v_D^1, v_D^2, s_1)\Big]. \end{aligned} \tag{A-30}$$

This expression is strictly convex in $b_1 \geq s_1$, and strictly negative evaluated at $b_1 = s_1$ for any $\delta \in [0, 1)$ under Assumptions 1 and 2, so that there exists at most one $b_D(v_D^1) > s_1$ such that (5) is weakly positive if and only if $b_1 \geq b_D(v_D^1)$. Likewise, FG's relative value of an agreement with transfer b_1 is

$$(1-\delta)(v_F - b_1) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) V_F(v_D^2, b_1) - (1-\delta)0 - \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) V_F(v_D^2, s_1), \tag{A-31}$$

which is strictly concave, and which it is easy to show admits a unique $b_F \in (s_1, v_F)$ such that (A-31) is non-negative if and only if $b_1 \leq b_F$. We conclude that a transfer that generates a weakly positive relative value of agreement for both DG_1 and FG exists if and only if $b_D(v_D^1) \leq b_F$, which is equivalent to $(1-\delta)(v_D^1 + v_F)$. Since (A-30) is strictly convex, for any $\delta > 0$, DG_1's value from an agreement with transfer b_1 is strictly increasing in $b_1 \geq b_D(v_D^1)$, so that DG_1's optimal offer whenever $b_D(v_D^1) \leq b_F$ is b_F, i.e., the transfer equating (A-31) with zero. $\square$

Endogenous Transitions. Consider, now, the setting in which the domestic pivotal voter freely chooses the identity of her date-2 domestic government. We extend Propositions 3 and 2 in the main text to a setting in which the domestic government makes the date-1 offer.

Proposition E2 (*Domestic Government Makes Date-1 Offer*). Suppose DG_1 makes the date-1 offer to FG. If DG_1 is friendly, parts (1) and (2) of Proposition 3 apply; moreover, whenever a date-1 agreement is signed, friendly DG_1 retains all of the surplus from agreement. If DG_1 is hostile, parts (1) and (2) of Proposition 2 apply; moreover, whenever a date-1 agreement is signed, hostile DG_1 retains all of the surplus from agreement.

Proof of Proposition E2. Straightforward extension of Proposition E1. □

F. Electoral Competition with Platform Commitments.[3] Our benchmark presentation assumes that the parties cannot commit to their bargaining postures between dates. That is, the friendly party is pre-committed to negotiating with bargaining posture $\overline{v}$ at date 2, and the hostile party is pre-committed to bargaining posture $\underline{v}$.

We now modify this assumption by supposing that, between dates 1 and 2 but *before* v^{med} is realized, the friendly and hostile parties simultaneously commit to bargaining postures (i.e., 'platforms') $v \in [v_L, v_H]$. The interpretation is that, if elected, a party that commits to a bargaining posture v will negotiate as if it had intrinsic value v. A bargaining posture thus serves as an electoral platform. We do not derive date-1 negotiation outcomes, focusing instead on the strategic platform choices of parties between dates 1 and 2 for a given status quo s_2.

We assume $v_L < \underline{v} < \overline{v} < v_H$, and for simplicity, we set $w = 0$, i.e., we focus on a setting in which parties are purely policy-motivated. The assumption $v_L < \underline{v}$ allows the hostile party with value $\underline{v}$ to commit to a bargaining posture that is more hostile than its intrinsic attitude to the project, and the assumption $v_H > \overline{v}$ allows the friendly party with value $\overline{v}$ to commit to a bargaining posture that is more friendly than its intrinsic attitude to the project. We extend Assumption 1 by assuming that there is sufficient uncertainty about the preference shock, λ, by assuming $\sigma > v_F + v_H$ and $-\sigma < v_L$. Finally, we assume that $v^e \in (\underline{v}, \overline{v})$, i.e., the median voter's expected value from the project lies strictly between the project values of the two parties.

Proposition F1. Given a status quo s_2, the hostile party commits to a platform $\underline{v}'$ and the friendly party commits to a platform $\overline{v}'$ satisfying:

$$\underline{v} - (v_F - s_2) < \underline{v}' < \overline{v}' < \overline{v} - (v_F - s_2). \tag{A-32}$$

A precise characterization of the platforms is given in the proof. To interpret the conditions in (A-32), recall that when the status quo offer is s_2, the most preferred negotiating posture of a party with value $v \in \{\underline{v}, \overline{v}\}$ in between dates is $v - (v_F - s_2)$. The proposition reveals that electoral competition induces each party to moderate its platform to trade off its intrinsic policy preferences with its desire to attract the support of the electorate, as in a classical Calvert-Wittman framework. Figure 4 illustrates equilibrium platforms for a context in which the hostile party's value $\underline{v}$ and the friendly party's value $\overline{v}$ are located on opposite sides of, and equidistant from the expected pivotal voter's value v^e. The parties commit to bargaining postures that are equidistant from the expected pivotal voter's most preferred bargaining posture $v^e - (v_F - s_2)$.

[3] We thank Gilat Levy, who suggested this extension.

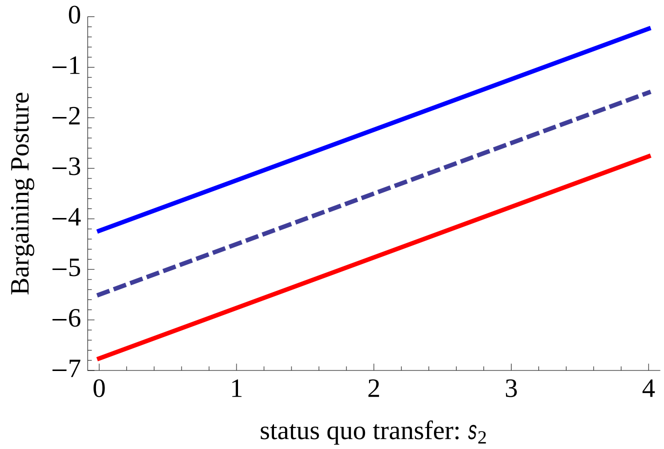


Figure 4 – Equilibrium bargaining postures for the friendly (*blue*) and hostile (*red*) parties, with the expected location of the pivotal voter's most preferred bargaining posture (*dashed*), as a function of the date-2 status quo transfer s_2. Parameters are: $\overline{v} = 0$, $\underline{v} = -3$, $v^e = -1.5$, $v_F = 4$, $\sigma = 8$, $\delta \in [0, 1]$, $\theta = 1$ and $\alpha = 8$.

Proof of Proposition F1. We have that for any platforms v and v', satisfying $v < v'$, the probability with which the party offering platform v is elected is:

$$P(v, v', s_2) = \int_{v^e-\alpha}^{\frac{v+v'}{2}+v_F-s_2} \frac{1}{2\alpha}\, dv^{\text{med}}. \tag{A-33}$$

We first claim that in equilibrium, the hostile party with value $\underline{v}$ chooses a platform $\underline{v}'$ and the friendly party with value $\overline{v}$ chooses a platform $\overline{v}'$ satisfying $\underline{v}' \leq \overline{v}'$. Suppose, to the contrary, that there exists an equilibrium in which $\underline{v}' > \overline{v}'$. If $\underline{v}' > \max\{\underline{v} - (v_F - s_2), \overline{v}'\}$, the hostile party can profitably deviate to $\max\{\underline{v} - (v_F - s_2), \overline{v}'\}$. Thus, $\underline{v}' \leq \max\{\overline{v}', \underline{v} - (v_F - s_2)\}$. This, together with the supposition $\underline{v}' > \overline{v}'$, yields $\overline{v}' < \underline{v} - (v_F - s_2)$. However, this and the supposition $\underline{v}' > \overline{v}'$ implies that the friendly party can profitably deviate to platform $\underline{v} - (v_F - s_2)$. Therefore, in equilibrium, $\underline{v}' \leq \overline{v}'$. Similarly, it is easy to show that $\underline{v} - (v_F - s_2) \leq \underline{v}'$ and $\overline{v}' \leq \overline{v} - (v_F - s_2)$. Therefore, in equilibrium, the platform $\underline{v}'$ chosen by hostile party with value $\underline{v}$ solves

$$\max_{\underline{v}' \in [v_L, v_H]} P(\underline{v}', \overline{v}', s_2) V_D(\underline{v}, \underline{v}', s_2)) + (1 - P(\underline{v}', \overline{v}', s_2)) V_D(\underline{v}, \overline{v}', s_2), \tag{A-34}$$

where

$$V_D(v, \tilde{v}, s_2) = \int_{-(\tilde{v}+s_2)}^{\sigma} (v + s_2 + \lambda) f(\lambda)\, d\lambda + \int_{-(\tilde{v}+v_F)}^{-(\tilde{v}+s_2)} (v - \tilde{v} + \theta(\tilde{v} + \lambda + v_F)) f(\lambda)\, d\lambda, \tag{A-35}$$

is the expected date-2 payoff of a domestic agent with value v when DG_2 negotiates with bargaining posture $\tilde{v}$—i.e., its strategy is the one that would be chosen by an agent with intrinsic value $\tilde{v}$. Similarly, the platform $\overline{v}'$ of the friendly party with value $\overline{v}$ solves

$$\max_{\overline{v}' \in [v_L, v_H]} \ P(\underline{v}', \overline{v}', s_2) V_D(\overline{v}, \underline{v}', s_2) + (1 - P(\underline{v}', \overline{v}', s_2)) V_D(\overline{v}, \overline{v}', s_2). \tag{A-36}$$

The first-order condition for $\underline{v}'$ is:

$$\frac{1}{2\alpha}\frac{1}{2}(V_D(\underline{v}, \underline{v}', s_2) - V_D(\underline{v}, \overline{v}', s_2)) + P(\underline{v}', \overline{v}', s_2)\frac{\partial V_D(\underline{v}, \underline{v}', s_2)}{\partial \underline{v}'} = 0. \tag{A-37}$$

which defines a unique (interior) solution if

$$\frac{1}{2\alpha}\frac{\partial V_D(\underline{v}, \underline{v}', s_2)}{\partial \underline{v}'} + P(\underline{v}', \overline{v}', s_2)\frac{\partial^2 V_D(\underline{v}, \underline{v}', s_2)}{\partial \underline{v}'^2} < 0, \tag{A-38}$$

where the inequality follows from (1) $\underline{v}' \geq \underline{v} - (v_F - s_2)$ and (2) $V(v, \tilde{v}, s_2)$ is strictly concave in $\tilde{v}$. Similarly, the first-order condition

$$\frac{1}{2\alpha}\frac{1}{2}(V_D(\overline{v}, \underline{v}', s_2) - V_D(\overline{v}, \overline{v}', s_2)) + (1 - P(\underline{v}', \overline{v}', s_2))\frac{\partial V_D(\overline{v}, \overline{v}', s_2)}{\partial \overline{v}'} = 0, \tag{A-39}$$

characterizes the unique interior solution for the friendly party's platform choice $\overline{v}'$. It follows that a pure strategy equilibrium exists and—by inspection of the first-order conditions—is characterized by a pair $(\underline{v}', \overline{v}')$ such that (1) $\underline{v} - (v_F - s_2) < \underline{v}' < \overline{v}' < \overline{v} - (v_F - s_2)$ and (2) $(\underline{v}', \overline{v}')$ simultaneously satisfy (A-37) and (A-39). $\square$

G. Other Dynamic Linkages. To facilitate a clear and tractable benchmark, our model presumes that there is a single dynamic linkage across dates 1 and 2, i.e., that the date-1 negotiation outcome determines the date-2 standing offer from FG to DG_2. Proposition 1 establishes two results, in a setting with exogenous turnover. First, a necessary and sufficient condition for a date-1 agreement is that the static surplus between the governments is positive. Second, the total *dynamic* surplus from an agreement is extracted by the foreign government.

In practice, there may be other dynamic linkages across dates. For example, the possibility of participating in a project at date 2 could depend on whether an agreement was signed at date 1. One might suppose that the chances of being able to pursue the project at date 2 are lower after an initial failure to pursue the project at date 1 ("the ship has sailed"). Another (related) possibility is that each of the foreign and domestic governments must incur fixed costs from commencing the project that are only expended at the onset of the agreement. Finally, the distribution of the date-2 domestic preference shock λ may depend on whether the domestic government is already a participant in an agreement at the start of date 2.

We reevaluate our benchmark result (Proposition 1) in the light of each of these three possibilities. Each of the three extensions illustrates how the total dynamic surplus from an agreement can depend on the date-1 negotiating outcome, even in a setting with exogenous turnover. In our first two extensions, a positive static surplus from an agreement between FG and DG_1 is not necessary for an agreement; in our final extension with endogenous preference shocks, depending on other primitives, a positive static surplus from agreement is either not necessary, or not sufficient for a date-1 agreement.

1. "The Ship Has Sailed". We modify our benchmark setting by allowing for the possibility that if no agreement is struck at date 1, the probability that the date-2 domestic government and the foreign government will have the opportunity to pursue the project at date 2 is $\tau \in [0, 1)$; if a date-1 agreement is reached, however, we maintain our benchmark assumption that the project can always continue at date 2 so long as both negotiating parties wish to participate.[4] All other aspects of the interaction remain unchanged from our benchmark setting. This could reflect an environment in which, if DG_1 refuses to participate at date 1, the governments anticipate that underlying conditions may change in the future that render the project infeasible, technologically or politically.

The date-two interaction proceeds as before; thus, DG_1 prefers to accept a date-1 offer b_1

[4] Formally, the probability that a date-2 agreement can be undertaken is $\tau(r_1)$, with $\tau(1) = 1$ and $\tau(0) = \tau < 1$.

from FG, i.e., choose $r_1(b_1) = 1$, if and only if

$$\begin{aligned}
&(1-\delta)(v_D^1 + b_1) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) \Big[\mathbf{1}[v_D^2 = v_D^1] w + \ V_D(v_D^1, v_D^2, b_1) \Big] \\
\geq \ &(1-\delta)0 \qquad\quad + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) \Big[\mathbf{1}[v_D^2 = v_D^1] w + \tau V_D(v_D^1, v_D^2, s_1) \Big], \qquad \text{(A-40)}
\end{aligned}$$

where we recall that w is the office rent that is enjoyed if and only if the incumbent is reelected, i.e., $v_D^2 = v_D^1$ (this does not depend on the date-2 project outcome, so it is not multiplied by τ), the continuation value $V_D(v_D^1, v_D^2, s_2)$ is defined in (3), and $\tau < 1$ is the probability that the governments will have the opportunity to pursue the date-2 project if there is no date-1 agreement (recall that if the project is not implemented at either date, all agents derive a payoff of zero at that date).[5] Thus, the foreign government's date-1 proposal solves:

$$\max_{b_1 \geq s_1} \ (1-\delta) r_1(b_1)(v_F - b_1) + \delta(r_1(b_1) + (1-r_1(b_1))\tau) \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) V_F(v_D^2, r_1(b_1) b_1 + (1-r_1(b_1)) s_1),$$

where $V_F(v_D^2, r_1(b_1)b_1 + (1-r_1(b_1))s_1)$ is defined in (4), subject to the constraint that $r_1(b_1) = 1$ if (A-40) holds, and $r_1(b_1) = 0$, otherwise. We observe that the total expected dynamic relative surplus from a date-1 agreement between FG and DG$_1$ with project valuation v_D^1 is:

$$(1-\delta)(v_D^1 + v_F) + \delta(1-\tau) \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) \int_{-(v_D^2 + v_F)}^{\sigma} (v_D^1 + v_F + \lambda). \qquad \text{(A-41)}$$

We obtain the following result, the proof of which is a direct extension of the proof of Proposition 1.

Proposition G1. When the identity of the date-2 domestic government does not depend on the date-1 agreement, the project is implemented at date-1 if and only if (A-41) is positive. Further, if the project is implemented at date 1, the foreign government extracts all surplus, offering the transfer that satisfies (A-40) with equality.

Notice that (A-41) is strictly positive whenever $v_D^1 + v_F \geq 0$, for any $\tau > 0$ and $\Pr(\underline{v}) \in [0, 1]$. Thus, a positive static surplus is sufficient, but not necessary, for a date-1 agreement to be reached.

2. Startup Costs. We modify our benchmark setting by allowing for the possibility of startup costs which need not be paid in subsequent periods. Specifically, we suppose that in the first

[5] We extend Assumption 2 to this setting by assuming that primitives are such that (A-40) is violated at $b_1 = s_1$.

date at which the project is implemented, i.e., the first date in which $r_t = 1$, all domestic agents incur a cost $c_D > 0$, while the foreign government incurs a cost $c_F > 0$, with $\max\{c_D, c_F\} < \sigma$. Thus, these costs are incurred at date 1 if the project is undertaken in date 1, or at date 2 if the project is undertaken at date 2, but was not undertaken at date 1. However, if the project was undertaken at date 1 (i.e., if $r_1 = 1$), the fixed cost of the project at date 2 for domestic agents is set to 0. For example, an environmental agreement may require one-off investments in an abatement technology, or the creation of relevant domestic regulatory agencies. Our extension reflects a context in which a portion of the costs associated with these investments are one-off, and need not be paid again over the life of the agreement.[6]

To analyze this setting, we define

$$\tilde{v}_D^2(r_1) = v_D^2 - (1 - r_1)c_D$$

to be the project value of DG_2, net of the per-period fixed cost. This fixed cost depends on whether the project was undertaken at date 1 ($r_1 = 1$), or whether no agreement was reached at that date ($r_1 = 0$). Similarly, we define

$$\tilde{v}_F(r_1) = v_F - (1 - r_1)c_F.$$

We begin by analyzing date 2 outcomes. If $\lambda > -(\tilde{v}_D^2(r_1) + s_2)$, there will be no amendment to the standing agreement, since DG_2 would prefer to implement the project at the status quo offer, rather than not implement the project. Similarly, if $\lambda < -(\tilde{v}_D^2(r_1) + \tilde{v}_F(r_1))$, there will be no date-2 agreement, since the static surplus at that date:

$$v_D^2 - (1 - r_1)c_D + v_F - (1 - r_1)c_F + \lambda$$

is strictly negative. Finally, if $\lambda \in [-(\tilde{v}_D^2(r_1) + \tilde{v}_F(r_1)), -(\tilde{v}_D^2(r_1) + s_2)]$, with probability θ an agreement is signed with an amended transfer $b_2(r_1) = -\tilde{v}_F(r_1)$; with complementary probability $1 - \theta$, an agreement is signed with an amended transfer $b_2(r_1) = -(\tilde{v}_D^2(r_1) + \lambda)$.

Following a similar approach to our benchmark setting, we may therefore write the expected date-2 project payoff of a domestic agent with date-1 project valuation v who anticipates that the date-2 domestic government will have project valuation v_D^2, will face status quo transfer s_2, and after a date-1 project outcome $r_1 \in \{0, 1\}$:

$$V_D(v, v_D^2, r_1, s_2) = \mathbb{I}[v_D^2 = v]w + \int_{-(\tilde{v}_D^2(r_1)+s_2)}^{\sigma} (\tilde{v}(r_1) + s_2 + \lambda) f(\lambda)\, d\lambda$$

[6] Our assumption that date-2 fixed costs are zero if the project was undertaken at date 1 is not important for any of our results: all that matters is that the costs are lower than at date 1.

$$+\int_{-(\tilde{v}_D^2(r_1)+\tilde{v}_F(r_1))}^{-(\tilde{v}_D^2(r_1)+s_2)} (v - v_D^2 + \theta(\tilde{v}_D^2(r_1) + \lambda + \tilde{v}_F(r_1)))f(\lambda)\, d\lambda. \tag{A-42}$$

Likewise, the expected date-2 project payoff of the foreign government FG given s_2 when it faces DG_2 with valuation v_D^2, and given a date-1 project outcome $r_1 \in \{0,1\}$ is:

$$\begin{aligned} V_F(v_D^2, r_1, s_2) = & \int_{-(\tilde{v}_D^2(r_1)+s_2)}^{\sigma} (\tilde{v}_F(r_1) - s_2)f(\lambda)\, d\lambda \\ & + \int_{-(\tilde{v}_D^2(r_1)+\tilde{v}_F(r_1))}^{-(\tilde{v}_D^2(r_1)+s_2)} [(1-\theta)(\tilde{v}_D^2(r_1) + \lambda + \tilde{v}_F(r_1))]f(\lambda)\, d\lambda. \end{aligned} \tag{A-43}$$

The sum of (A-42) and (A-43) is:

$$\Delta(v, v_D^2, r_1) = \mathbb{I}[v_D^2 = v]w + \int_{-(\tilde{v}_D^2(r_1)+\tilde{v}_F(r_1))}^{\sigma} (\tilde{v}_D^1(r_1) + \tilde{v}_F(r_1) + \lambda)f(\lambda)d\lambda. \tag{A-44}$$

We therefore have that $\Delta(v, v_D^2, 1) - \Delta(v, v_D^2, 0) > 0$ if $v_D^1 + v_F > .5(c_F + c_D) - \sigma$, which holds if $v_D^1 + v_F \geq 0$, i.e., whenever the static date-1 surplus is positive. Thus, we may write the total expected relative date-1 surplus from an agreement between FG and DG_1 with project valuation $v_D^1 \in \{\underline{v}, \overline{v}\}$:

$$(1-\delta)(v_D^1 - c_D + v_F - c_F) + \delta \Pr(\underline{v})[\Delta(v_D^1, \underline{v}, 1) - \Delta(v_D^1, \underline{v}, 0)] + \delta \Pr(\overline{v})[\Delta(v_D^1, \overline{v}, 1) - \Delta(v_D^1, \overline{v}, 0)]. \tag{A-45}$$

Notice that so long as either $c_D > 0$ or $c_F > 0$, the term multiplied by δ in this expression is strictly positive, thereby differing from the corresponding expression (7). At date 1, the foreign government FG makes a proposal to the domestic government DG_1, with value $v_D^1 \in \{\underline{v}, \overline{v}\}$. DG_1 accepts the offer, i.e., chooses $r_1(b_1) = 1$, if and only if:

$$\begin{aligned} & (1-\delta)(v_D^1 + b_1 - c_D) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) V_D(v_D^1, v_D^2, 1, b_1) \\ \geq\ & (1-\delta)0 \qquad\qquad\qquad + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) V_D(v_D^1, v_D^2, 0, s_1). \end{aligned} \tag{A-46}$$

The Foreign government's date-1 proposal solves:

$$\max_{b_1 \geq s_1} \ (1-\delta)r_1(b_1)(v_F - b_1 - c_F) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) V_F(v_D^2, r_1(b_1), r_1(b_1)b_1 + (1 - r_1(b_1))s_1),$$

subject to the constraint that $r_1(b_1) = 1$ if (A-46) holds, and $r_1(b_1) = 0$, otherwise.[7] We have the

[7] We extend Assumption 2 to this setting by assuming that primitives are such that (A-46) is violated at $b_1 = s_1$.

following result.

Proposition G2. If the identity of the date-2 domestic government does not depend on the date-1 agreement, the project is implemented at date-1 if and only if (A-45) is positive. Further, if the project is implemented at date 1, the foreign government extracts all surplus, offering the transfer that satisfies (A-46) with equality.

To see that a date-1 agreement can be signed even when the static surplus is negative, notice that even when $v_D^1 + v_F = c_D + c_F$, i.e., the static surplus from a date-1 agreement between the date-1 governments is zero, the total *dynamic* surplus from an agreement is strictly positive. However, it remains true—as in our benchmark—that FG extracts fully extracts the surplus with its offer to DG$_1$.

3. Preference shocks depend on date-1 outcome. We modify our benchmark setting by allowing the distribution of the date-2 preference shock, λ, to depend on whether the domestic country is already a participant in the agreement, i.e., whether $r_1 = 1$. For example, countries that have already participated in a currency union may be more sensitive to shocks from other member states than countries that are considering whether to accede to the union for the first time. Alternatively, they may be liable for contingent guarantees or concessions that new signatories are not required to provide. Formally, the distribution of the date-2 preference shock, λ, is $F(\lambda; r_1)$, uniform on $[\overline{\lambda}_{r_1} - \sigma_{r_1}, \overline{\lambda}_{r_1} + \sigma_{r_1}]$, where $r_1 \in \{0, 1\}$ reflects whether a date-1 agreement was signed between the governments.[8] We extend Assumption 3 to this setting by assuming that for $r_1 \in \{0, 1\}$, $v_F + \overline{v} + \overline{\lambda}_{r_1} - \sigma_{r_1} < 0$, and $\underline{v} + s_1 + \overline{\lambda}_{r_1} + \sigma_{r_1} > 0$, and Assumption 2 by assuming that primitives satisfy, for $v_D^1 \in \{\underline{v}, \overline{v}\}$:

$$(1-\delta)(v_D^1 + s_1) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2)(V_D(v_D^1, v_D^2, 1, s_1) - V_D(v_D^1, v_D^2, 0, s_1)] < 0,$$

where:

$$V_D(v_D^1, v_D^2, r_1, s_2) = \mathbb{I}[v_D^2 = v]w + \int_{-(v_D^2+s_2)}^{\overline{\lambda}_{r_1}+\sigma} (v + s_2 + \lambda) f(\lambda; r_1)\, d\lambda$$
$$+ \int_{-(v_D^2+v_F)}^{-(v_D^2+s_2)} (v - v_D^2 + \theta(v_D^2 + \lambda + v_F)) f(\lambda; r_1)\, d\lambda. \tag{A-47}$$

This restriction is necessary and sufficient for the date-1 participation constraint of the domestic government to be non-trivial. Using similar reasoning to the previous extensions, we have

[8] We maintain the assumption of uniformity under both distributions for consistency with our benchmark setting; however, the results below do not depend on this assumption.

that the total expected dynamic surplus from a date-1 agreement between FG and DG_1 with date-1 valuation $v_D^1 \in \{\underline{v}, \overline{v}\}$ is:

$$(1-\delta)(v_D^1+v_F)+\delta \Pr(\underline{v})\left[\int_{-(\underline{v}+v_F)}^{\overline{\lambda}_1+\sigma_1}(v_D^1+v_F+\lambda)f(\lambda;1)d\lambda-\int_{-(\underline{v}+v_F)}^{\overline{\lambda}_0+\sigma_0}(v_D^1+v_F+\lambda)f(\lambda;0)d\lambda\right]$$
$$+\delta \Pr(\overline{v})\left[\int_{-(\overline{v}+v_F)}^{\overline{\lambda}_1+\sigma_1}(v_D^1+v_F+\lambda)f(\lambda;1)d\lambda-\int_{-(\overline{v}+v_F)}^{\overline{\lambda}_0+\sigma_0}(v_D^1+v_F+\lambda)f(\lambda;0)d\lambda\right]. \tag{A-48}$$

We have the following result, the proof of which is similar to Proposition 1.

Proposition G3. When the identity of the date-2 domestic government does not depend on the date-1 agreement, the project is implemented at date-1 if and only if (A-48) is positive. Further, if the project is implemented at date 1, the foreign government extracts all surplus.

Notice that, in contrast with the two previous cases, that the terms multiplied by δ in expression (A-48) may be positive or negative. Consider, for example, a context in which $\overline{\lambda}_1 = \overline{\lambda}_0$, and suppose that DG_1 is relatively hostile, i.e., with date-1 project valuation $\underline{v}$. If $v_D^1 = \underline{v} = -v_F$, the static surplus from an agreement between hostile DG_1 and FG is zero, but the dynamic surplus is positive if and only if $\sigma_1 > \sigma_0$.

H. Comparing Transfers with Exogenous and Endogenous Turnover. Corollary 1 highlights that, in our setting with endogenous turnover, *if* a date-1 agreement is reached between relatively hostile DG_1 with date-1 project valuation $\underline{v}$ and FG, the transfer from FG to DG_1 is larger than the transfer that would have been negotiated between FG and relatively friendly DG_1 with date-1 project valuation $\overline{v} > \underline{v}$, in the event of an agreement. In this Supplemental Appendix, we provide additional results that order the transfers from FG to DG_1 with project valuation $v_D^1 \in \{\underline{v}, \overline{v}\}$ (1) within the context of exogenous turnover (i.e., the counterpoint to Corollary 1 for the setting with exogenous turnover), and (2) across our settings with exogenous versus endogenous turnover.

We write the relative value of participation for DG_1 with project valuation v_D^1, in the setting with *exogenous* turnover:

$$\begin{aligned} &(1-\delta)(v_D^1 + b_1) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) \Big[\mathbf{1}[v_D^2 = v_D^1] w + V_D(v_D^1, v_D^2, b_1) \Big] \\ - \; &(1-\delta)0 \qquad\quad - \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2) \Big[\mathbf{1}[v_D^2 = v_D^1] w + V_D(v_D^1, v_D^2, s_1) \Big]. \end{aligned} \tag{A-49}$$

DG_1's corresponding relative value of participation for DG_1 in the setting with *endogenous* turnover is:

$$\begin{aligned} &(1-\delta)(v_D^1 + b_1) + \delta \Pr(v^{\text{med}} \le \hat{v}(b_1))(\mathbf{1}[v_D^1 = \underline{v}] w + V_D(v_D^1, \underline{v}, b_1)) \\ &\qquad\qquad\qquad\quad + \delta \Pr(v^{\text{med}} > \hat{v}(b_1))(\mathbf{1}[v_D^1 = \overline{v}] w + V_D(v_D^1, \overline{v}, b_1)) \\ - &(1-\delta)0 \qquad\qquad - \delta \Pr(v^{\text{med}} \le \hat{v}(s_1))(\mathbf{1}[v_D^1 = \underline{v}] w + V_D(v_D^1, \underline{v}, s_1)) \\ &\qquad\qquad\qquad\quad - \delta \Pr(v^{\text{med}} > \hat{v}(s_1))(\mathbf{1}[v_D^1 = \overline{v}] w + V_D(v_D^1, \overline{v}, s_1)), \end{aligned} \tag{A-50}$$

where we recall:

$$\Pr(v^{\text{med}} \le \hat{v}(z)) = \frac{.5(\underline{v} + \overline{v}) + (v_F - z) - (v^e - \alpha)}{2\alpha},$$

which is contained in $(0, 1)$ by Assumption 3.

We use the following notation:

1. $b_1^{EX}(v_D^1)$ denotes the transfer that solves the date-1 domestic government's participation constraint under *exogenous* turnover, when its project valuation is $v_D^1 \in \{\underline{v}, \overline{v}\}$, i.e., that sets (A-49) equal to zero,
2. $b_1^{EN}(v_D^1)$ denotes the transfer that solves the date-1 domestic government's participation constraint under *endogenous* turnover, when its project valuation is $v_D^1 \in \{\underline{v}, \overline{v}\}$. i.e., that

sets (A-50) equal to zero.

The following Proposition highlights our additional results.

Proposition H1.

1. $b_1^{EX}(\underline{v}) > b_1^{EX}(\overline{v})$,
2. if $b_1^{EN}(\overline{v}) \geq b_1^{EX}(\overline{v})$, then $b_1^{EN}(\underline{v}) \geq b_1^{EX}(\underline{v})$

Finally, $b_1^{EN}(\overline{v}) < b_1^{EX}(\overline{v})$, and $b_1^{EN}(\underline{v}) > b_1^{EX}(\underline{v})$, if:

3a. w is sufficiently large, or

3b. $|\Pr(v^{\text{med}} \leq \hat{v}(s_1)) - \Pr(\underline{v})|$ is sufficiently small.

Moreover, it is always true that $b_1^{EN}(\underline{v}) > \max\{b_1^{EN}(\overline{v}), b^*(\delta)\}$, where $b^*(\delta)$ solves the first-order condition of FG when facing friendly DG_1 in the setting with endogenous turnover (Corollary 1).

The first point states that in the setting with exogenous turnover, any date-1 transfer from FG to relatively hostile DG_1 is larger than the corresponding transfer from FG to relatively friendly DG_1. The second point states that, if the transfer from FG to relatively *friendly* DG_1 is larger in the setting with endogenous turnover, versus the setting with exogenous turnover, then the same is also true of the transfer from FG to relatively *hostile* DG_1. Finally, sufficient conditions are given for the transfer to relatively friendly DG_1 to *decrease* in the setting with endogenous turnover, vis-a-vis the setting with exogenous turnover, and for the transfer to relatively hostile DG_1 to *increase* in the setting with endogenous turnover, vis-a-vis the setting with exogenous turnover. These sufficient conditions are large relative concern for holding office, or the exogenous probability that the hostile party is elected in our benchmark setting is close enough to the default prospect that the hostile party is elected in our setting with endogenous turnover.

Proof of Proposition H1. To prove the first point, it is sufficient to observe that the difference of (A-49) evaluated at $\underline{v}$ and (A-49) evaluated at $\overline{v}$ is strictly negative. To prove the second point, we take the difference of the relative value of agreement to DG_1 with valuation $v_D^1 \in \{\underline{v}, \overline{v}\}$ under exogenous versus endogenous turnover, i.e., the difference of (A-49) and (A-50):

$$\begin{aligned}\Xi(v_D^1) \equiv\, &\delta[\Pr(\underline{v}) - \Pr(v^{\text{med}} \leq \hat{v}(b_1))](V_D(v_D^1, \underline{v}, b_1) - V_D(v_D^1, \overline{v}, b_1)) \\ &- \delta[\Pr(\underline{v}) - \Pr(v^{\text{med}} \leq \hat{v}(s_1))](V_D(v_D^1, \underline{v}, s_1) - V_D(v_D^1, \overline{v}, s_1))\end{aligned}$$

$$-\delta[\Pr(v^{\text{med}} \leq \hat{v}(b_1)) - \Pr(v^{\text{med}} \leq \hat{v}(s_1))]w(\mathbf{1}[v_D^1 = \underline{v}] - \mathbf{1}[v_D^1 = \overline{v}]), \tag{A-51}$$

and observe that, after straightforward algebra, we observe that $\Xi(\overline{v}) < \Xi(\underline{v})$ if $\Pr(v^{\text{med}} \leq \hat{v}(b_1)) - \Pr(v^{\text{med}} \leq \hat{v}(s_1)) < 0$, which is true. Thus, $\Xi(\overline{v}) > 0$ implies $\Xi(\underline{v}) > 0$. We finally prove that either of conditions 3a or 3b is sufficient for $b_1^{EN}(\overline{v}) < b_1^{EX}(\overline{v})$, and $b_1^{EN}(\underline{v}) > b_1^{EX}(\underline{v})$. Using the fact that:

$$V_D(v_D^1, \underline{v}, s_1) - V_D(v_D^1, \overline{v}, s_1) = V_D(v_D^1, \underline{v}, b_1) - V_D(v_D^1, \overline{v}, b_1) + \frac{\overline{v} - \underline{v}}{2\sigma}(b_1 - s_1), \tag{A-52}$$

$$\begin{aligned}\Xi(v_D^1) = {} & \delta(\Pr(v^{\text{med}} \leq \hat{v}(s_1)) - \Pr(v^{\text{med}} \leq \hat{v}(b_1)))(\mathbf{1}[v_D^1 = \underline{v}]w - \mathbf{1}[v_D^1 = \overline{v}]w) \\ & + \delta(\Pr(v^{\text{med}} \leq \hat{v}(s_1)) - \Pr(v^{\text{med}} \leq \hat{v}(b_1)))(V_D(v_D^1, \underline{v}, b_1) - V_D(v_D^1, \overline{v}, b_1)) \\ & - \delta(\Pr(\underline{v}) - \Pr(v^{\text{med}} \leq \hat{v}(s_1)))\frac{(\overline{v} - \underline{v})(b_1 - s_1)}{2\sigma},\end{aligned} \tag{A-53}$$

By inspection, we note $\lim_{w\to\infty} \Xi(\overline{v}) < 0$ and $\lim_{w\to\infty} \Xi(\underline{v}) > 0$. Finally, if $\Pr(\underline{v}) = \Pr(v^{\text{med}} \leq \hat{v}(s_1))$, (A-53) is strictly positive for $v_D^1 = \underline{v}$, and strictly negative for $v_D^1 = \overline{v}$. We conclude that if $|\Pr(\underline{v}) - \Pr(v^{\text{med}} \leq \hat{v}(s_1))|$ is sufficiently small, $b_1^{EN}(\overline{v}) < b_1^{EX}(\overline{v})$, and $b_1^{EN}(\underline{v}) > b_1^{EX}(\underline{v})$. $\square$

I. Inefficiency with Endogenous Turnover: an Example. Proposition 1 establishes that in a setting with exogenous turnover, a date-1 agreement is signed whenever it is efficient to undertake the project, i.e., when the dynamic surplus from an agreement between DG_1 with project valuation v_D^1 and FG with project valuation FG is positive. The proposition also establishes that the dynamic surplus from an agreement is positive if and only if the static surplus is positive. So, in the setting with exogenous turnover, date-1 negotiation outcomes are always efficient.

In a setting with endogenous turnover, conditions for static efficiency and dynamic efficiency do not coincide. Moreover, it is possible that—fixing all primitives—there exists a transfer $b_1 > s_1$ from FG to DG_1 with project valuation v_D^1 for which the surplus from an agreement is positive (i.e., expression (13) is positive) but where, nonetheless, for for any transfer b_1 such that DG_1 prefers to implement the project, i.e., prefers $r_1(b_1) = 1$, FG prefers to make an offer that induces DG_1 to choose *not* to implement the project.

For an example of this phenomenon, consider the parameters $v_F = 3$, $\underline{v} = -2$, $\overline{v} = -.5$, $s_1 = 0$, $\sigma = 4$, $\alpha = 6$, $v^e = 0$, $\theta = 1$, $\delta = .6$, and $w = 4$. In the case of exogenous turnover, an agreement between DG_1 with project valuation $\underline{v}$ and FG with valuation v_F is statically and dynamically efficient, and will be signed.

Consider, instead, the case of endogenous turnover. In that case, DG_1 with project valuation v_L, chooses $r_1(b_1) = 1$ if and only if:

$$\begin{aligned}(1-\delta)(\underline{v}+b_1) + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2)\left[\mathbf{1}[v_D^2 = \underline{v}]w + V_D(v_D^1, v_D^2, b_1)\right] \\ \geq (1-\delta)0 \qquad + \delta \sum_{v_D^2 \in \{\underline{v}, \overline{v}\}} \Pr(v_D^2)\left[\mathbf{1}[v_D^2 = \underline{v}]w + V_D(v_D^1, v_D^2, s_1)\right],\end{aligned} \tag{A-54}$$

simplifies to the condition $r_1(b_1) = 1$ if and only if $b_1 \geq 2.40514$. Likewise, FG's offer solves:

$$\begin{aligned}\max_{b_1 \geq s_1} \ (1-\delta)r_1(b_1)(v_F - b_1) + \delta \Pr(v^{\text{med}} \leq \hat{v}(s_2(r_1(b_1), b_1)))V_F(\underline{v}, s_2(r_1(b_1), b_1)) \\ + \delta \Pr(v^{\text{med}} > \hat{v}(s_2(r_1(b_1), b_1)))V_F(\overline{v}, s_2(r_1(b_1), b_1)),\end{aligned} \tag{A-55}$$

which implies that FG prefers an offer b_1 that yields $r_1(b_1)$ if and only if $b_1 \leq 2.27121$. Thus, no date-1 agreement is signed. However, the total surplus from an agreement:

$$(1-\delta)(v_F + \underline{v}) + \delta(\Pr(v^{\text{med}} \leq \hat{v}(b_1)) - \Pr(v^{\text{med}} \leq \hat{v}(s_1)))(\Delta(\underline{v}, \underline{v}) - \Delta(\underline{v}, \overline{v})), \tag{A-56}$$

is strictly positive for all $b_1 \in [0, 1.93208]$. This highlights that inefficient date-1 negotiation outcomes can arise in the setting with endogenous turnover.