

III. Development and Conflict

Outline

- 1. Background: Development and Conflict**
- 2. Economics and Coercion**
- 3. Violence and Social Welfare**
- 4. Why do people rebel? Evidence and Models**
- 5. Rebel Tactics I: Terrorist clubs.**
- 6. Rebel Tactics II: “Hearts and Minds”**
- 7. Resources and Data**

1. Background

- ***“More than 1.5 billion people live in countries affected by violent conflict. **The World Development Report 2011: Conflict, Security, and Development** examines the changing nature of violence in the 21st century, and underlines the negative impact of repeated cycles of violence on a country or region’s development prospects. Preventing violence and building peaceful states that respond to the aspirations of their citizens requires strong leadership and concerted national and international efforts.”***
<http://wdr2011.worldbank.org>
- **Empirical Studies of Conflict (ESOC)**
- **Development and Conflict Research (DACOR)**



Security and Development:

USAID top 20 recipients, 2011

	Country	FY 2011
1	Afghanistan	1,438,596,449
2	Haiti	970,910,372
3	Kenya	498,728,751
4	Jordan	460,251,837
5	Pakistan	393,000,846
6	Tanzania	371,859,231
7	South Africa Republic	348,995,068
8	Nigeria	336,053,916
9	Democratic Republic of Congo	265,018,524
10	South Sudan	264,407,305
11	West Bank/Gaza	245,378,605
12	Iraq	242,860,393
13	Zambia	229,272,026
14	Uganda	221,891,934
15	Colombia	192,362,083
16	Israel	190,526,897
17	Indonesia	182,565,755
18	Ethiopia	182,143,079
19	Mozambique	175,572,408
20	Liberia	168,738,471

- **Most of the 20 have suffered civil war or internal political violence since 1980**

Sources:

<http://www.usaid.gov/policy/budget/money/2011/>

http://www.usaid.gov/policy/budget/cbj2011/2011_CBJ_SummaryTables.pdf

Fearon & Laitin data on civil wars, see Fearon and Laitin (2003)

Background: Development spending shifts toward fragile states

- UK Department for International Development (DFID) 5 year plan
- ~\$12.5B / year
- 22 of 28 priority countries are “fragile or conflict affected”
- Two motivations:
 1. traditional development
 2. development as a tool of counterterrorism and counterinsurgency

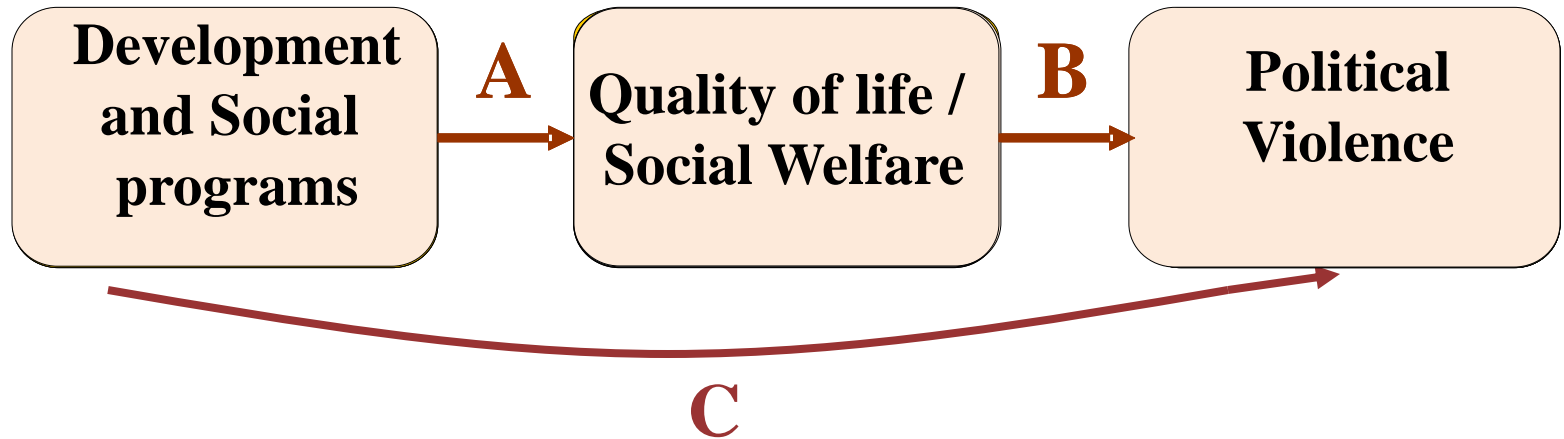
note: these are the most common sources of modern warfare, 4x as prevalent as interstate war



Key ■ DFID focus countries ■ DFID programmes closing

Sources: <http://www.dfid.gov.uk/Media-Room/News-Stories/2011/The-future-of-UK-aid/>
<http://www.dfid.gov.uk/Documents/DFID-business-plan.pdf>

Development Programs and Conflict



- Most of labor and development economics is about effect A, how programs improve social welfare
- Efforts to combat terrorism/insurgency and restore political order typically involve aid, and development research typically also involves effect A, but the objective is political stability.
- Two major research questions:
 1. Why are people rebelling in the first place?
 2. What do we know about effects B, or maybe C?

2. Economics and Coercion

Social welfare maximization

Textbook approach to social welfare maximization; how robust it is to weak institutions?

- Individual utility: $U_i = u(c_i) + v(g)$, for $i=1 \dots N$ identical individuals,
- g nonrival, nonexcludable public good, $g \geq 0$, $u(\cdot)$ and $v(\cdot)$ are concave functions, $u(0)=v(0)=0$.
- Individual budget constraint: $c_i = I_i - t_i$
 $I \geq 0$ is income, $t \geq 0$ is a tax which cannot exceed I .
- Government collects taxes and allocates part of receipts to producing the public good g using the technology $g = g(Nt-l)$;
 $l \geq 0$ is *leakage* due to corruption or poor management, $Nt \geq l$.
 $g(\cdot)$ is concave, with $g(0)=0$.

Social welfare maximization

$$\max_{g,t,l} \sum_{i=1}^N U_i$$

$$\text{s.t. } g = g(N(I-c)-l),$$

yields

$$l^*=0, t^*>0,$$

$$u'(c^*) = Nv'(g^*)g'(Nt^*)$$

at point **A**.

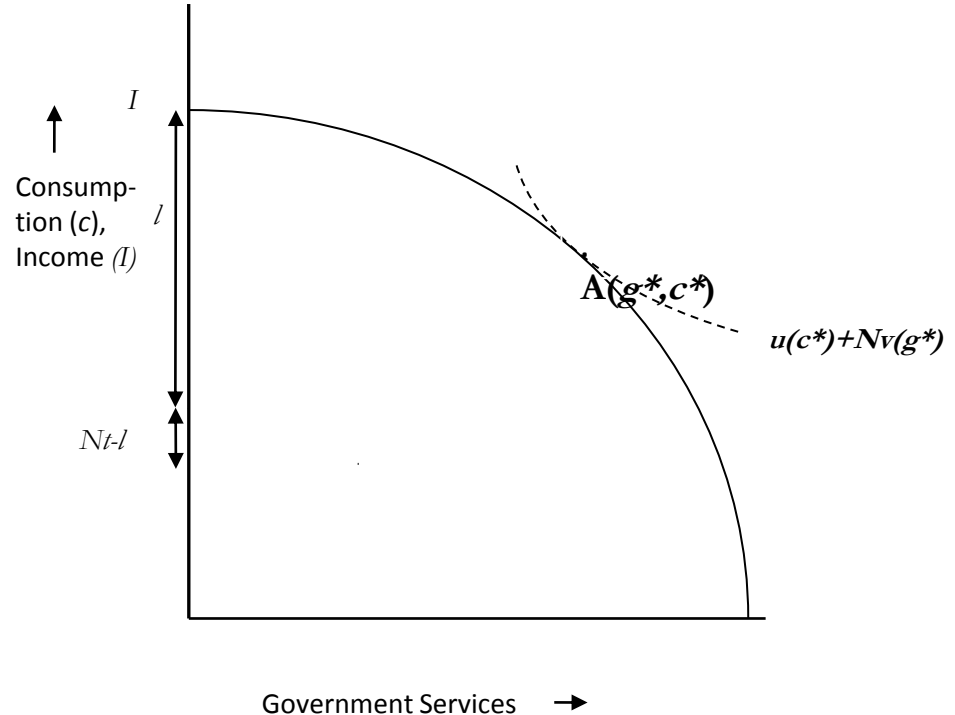


Figure 1: Public Economics in Democracy

Democracy: Any voting rule that equally enfranchises all N individuals will yield the solution at **A**.

Coercion and Kleptocracy

- **Problem:** Why pay taxes?

$$U_i(I-t^*, g^*) < U_i(I, g^*)$$

- **Usual Solution:** We assume government has *coercive power* (& assume costless coercion).

- **Problem:** If so, what prevents kleptocracy?

$$\max_{g,t,l} u(l)$$

$$\text{s.t. } g = g(N(I-c)-l)$$

which yields $t^{**}=I$, $l^{**}=NI$ and $g^{**}=0$.

i.e., government steals everything.

- **Usual Solution:** Assume government coercion is institutionally checked, e.g., by an independent judiciary.
- To summarize: coercion and enforcement have very particular implicit assumptions; the institutions of modern liberal democracy.

Literature: Kleptocrats, Public Finance and Nation Building

What if the Government is not a social welfare maximizer, or a violence-minimizer?

- **Margaret Levi (*Of Rule and Revenue*, 1988)**
- Government as Revenue Maximizer
- **Herschel Grossman and Suk Jae Noh (*Econ. & Politics* 1990, *JPubEcon* 1994)**
- Rebellion constraint on kleptocratic government
- **Martin McGuire and Mancur Olson (*JEL*, 1996)**
- Incentive constraints on kleptocrats: effort, disincentives to invest, productive public goods.

Nation building:

- **David Lake (2007) “Building Legitimate States After Civil Wars: Order, Authority, and Institutions.”**
- **_____ (2006) “Relational Authority in the Modern World: Towards a Positive Theory of Legitimacy”**
- How the international community tries to build legitimacy.

Constrained Kleptocracy

$$\max_{g,t,l} u(l)$$

such that $u(I-t) + v(g) \geq u(I)$,

i.e., **no tax revolt**.

and $g = g(N(I-c)-l)$.

- Yields a constrained optimum $l^{**} > l^c > l^* = 0$, $t^{**} > t^c > t^*$ and $0 = g^{**} < g^c < g^*$

at point **C**.

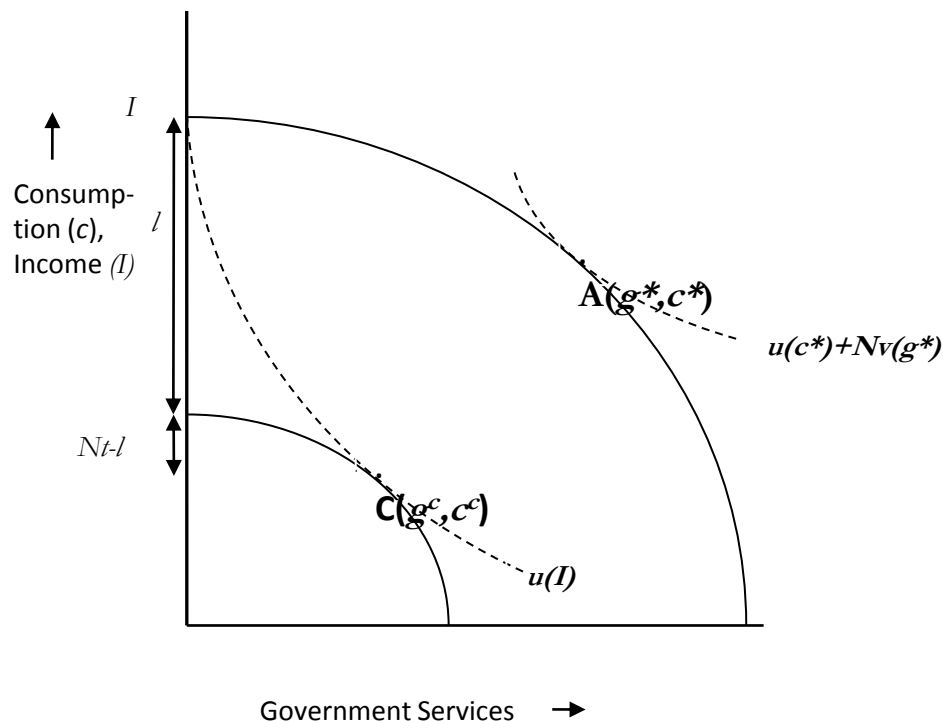


Figure 2: Public Economics in Democracy vs. Kleptocracy

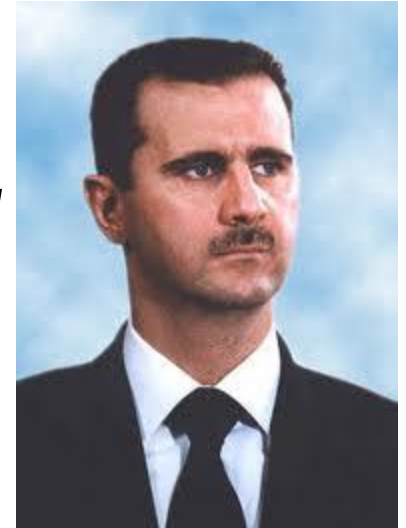
No tax revolt: The constraint that individuals do not coordinate to collectively not pay taxes. I.e., *collective consent* to taxation (Lake 06). Analogy to traffic tickets, prosecution of criminals and other necessarily coercive functions of government.

Note: This is distinct from full rebellion, regional rebellion, no information-sharing (BSF), passive resistance, and individual tax evasion.

Legitimacy

Legitimacy – what is it?

- ***"His regime has been built on fear and repression and if you take that away he has no legitimacy. If the people start to lose their fear he is finished. But they are not there yet."***



- **Amin Gemayyel, former Lebanese president, on Syrian president Bashar al-Assad, Oct 14 2011.**
- **.. and without fear and repression Assad *had* legitimacy?**

Legitimacy

- **Legitimacy: collective, contingent consent to be governed: i.e., cede to authority, e.g., obey laws, pay taxes.**
 - **definition lends itself to measurement by revealed preference**
- **“Because of legitimacy, people feel that they ought to defer to decisions and rules, following them voluntarily out of obligation rather than out of fear of punishment or anticipation of reward” (Tyler 2006)**
- **Procedural legitimacy: found in legal, political, and managerial settings (Tyler 2000, 2001; Hibbing & Theiss-Morse 2002, 2004).**
- **Procedural fairness shape political support (Kluegel& Mason (2004), lack can undermines political support (Seligson 2002)**
- **Procedural fairness → contingent consent (Levi 1988)**

Constrained Kleptocracy

$$\max_{g,t,l} u(l)$$

C is efficient in this simple static model, but in a dynamic model investment would be *inefficiently* low at predatory tax rates, or under extortion.

Not to mention deadweight loss due to standard Laffer curve argument.

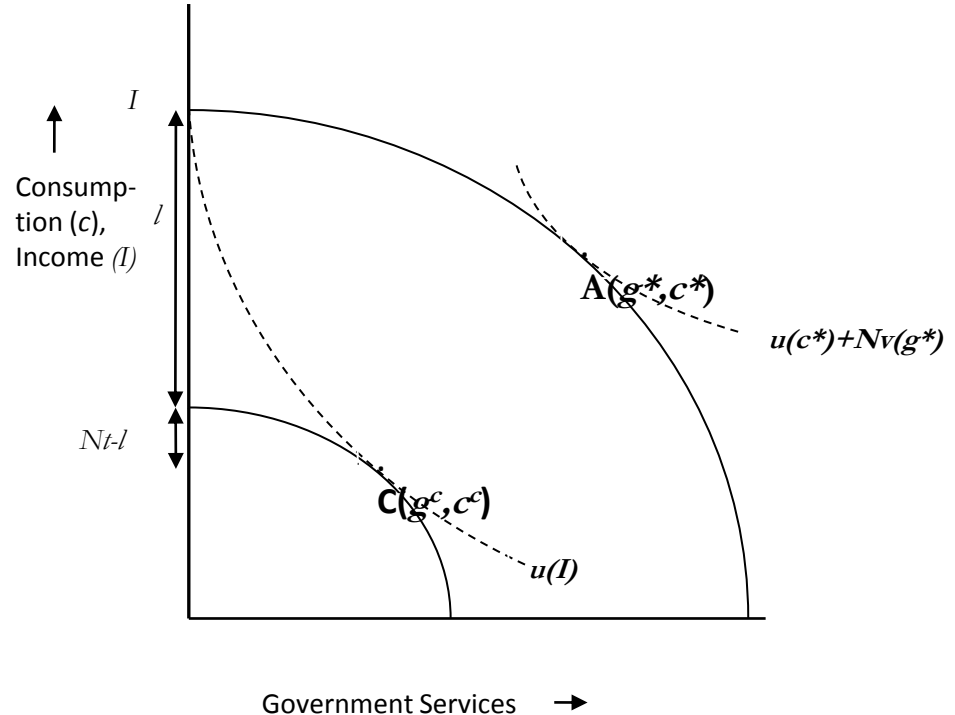


Figure 2: Public Economics in Democracy vs. Kleptocracy

Development Assistance under Democracy and Kleptocracy

A development assistance donation to government $d \geq 0$ will expand the potential consumption / public good frontier.

A democracy will get higher welfare at D.

A kleptocracy will still yield C, but with leakage increased by foreign assistance d .

Technical assistance to enhance g will not improve welfare either.

Direct assistance to individuals will not improve welfare if it is presented as coming from government, or if it depends on collective consent.

Extreme? Afghanistan has fallen on the TI corruption index as development assistance has accelerated. Danger of politically entrenching a corrupt regime.

Note: here's why development economists would care about governance quality (i.e., the checks on the behavior of institutions with coercive power).

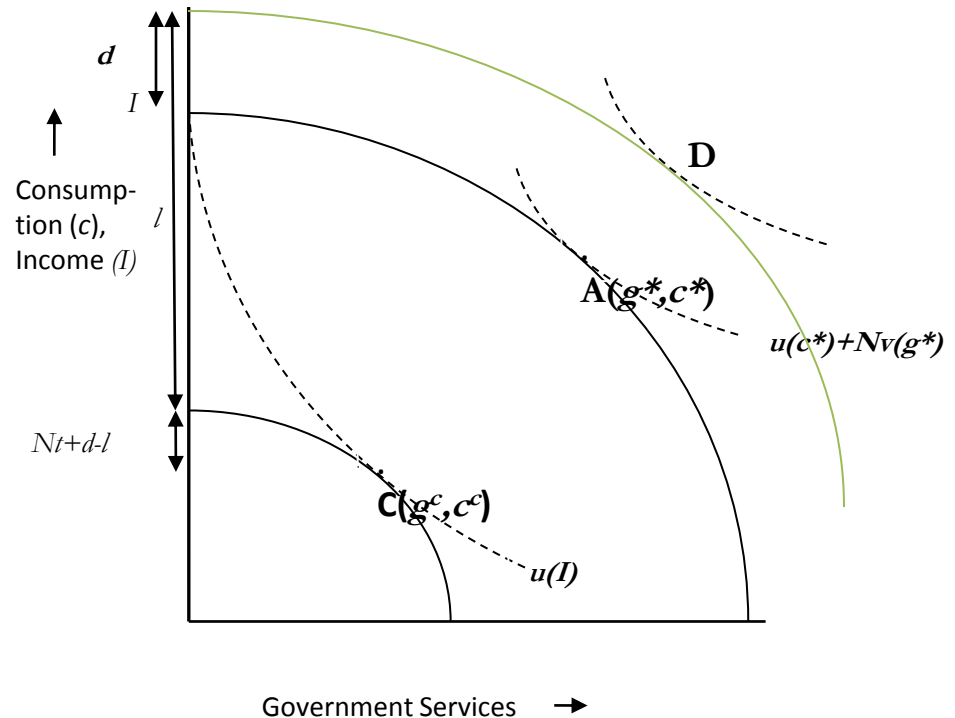


Figure 3: Development Assistance in Democracy vs. Kleptocracy

Weak Democratic Institutions

$$\max_{g,t,l} \alpha \sum_{i=1}^N U_i + (1-\alpha)u^k(l)$$

- Democratic institutions allocate a share α of power to individuals, $1 \geq \alpha \geq 0$.
- For values of α large enough that the no tax-revolt constraint ceases to bind, the optimal choice of g , t , and l map out a locus of tangencies between points C and A.
- Raising α reallocates leakage to higher public good provision and lower taxes.
- Note: so far no violence

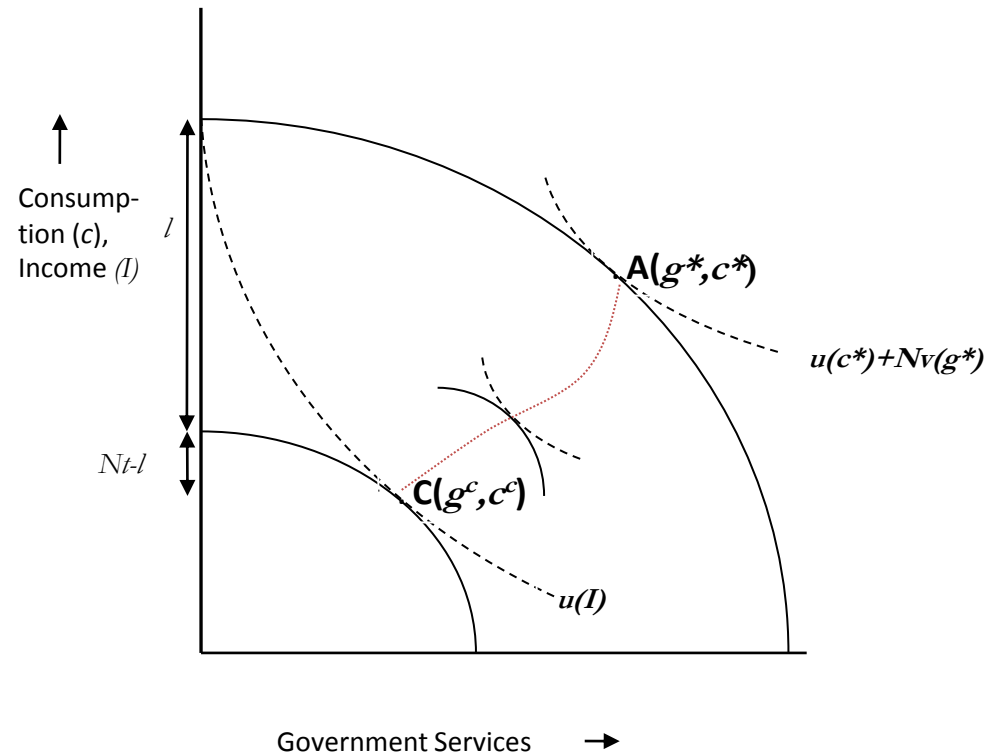


Figure 4: Weak Institutions and Social Welfare

Election fraud and faith in institutions

$$\max_{g,t,l} \alpha \sum_{i=1}^N U_i + (1 - \alpha)u^k(l)$$

- Who knows α before an election?
Nobody.
- An individual's prediction about the quality of services she can expect from the postelection government depends on her prediction of the random variable α .
- Observing fraudulent or suspicious behavior on election day, such as the destruction of vote tallies, should reduce her posterior estimate of α .
- Conversely, successful fraud-reduction supports a positive prediction about government service provision being responsive to the needs of individuals, making survey respondents more likely to seek services from government.
- In this sense fraud reduction increases (distributive) legitimacy.

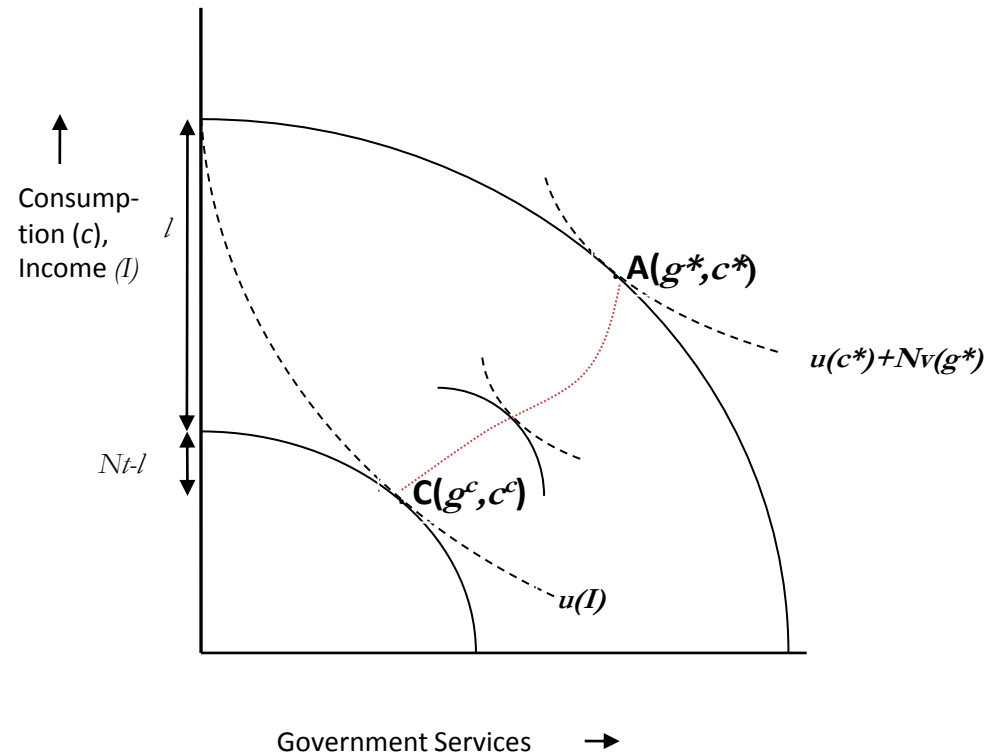


Figure 2: Weak Institutions and Social Welfare

3. Violence and Social Welfare

- **Is a violent outcome ever efficient?
Wouldn't extortion always be more efficient?**
- **Conditions for efficient Coasian bargains:**
 - a. perfect information,**
 - b. price taking,**
 - c. costless enforcement,**
 - d. rational choice,**
 - e. no transaction costs (divisible rents).**
- **Note: without wealth effects initial assignment of property would not change allocation.**
- **James Fearon (1995): "Rationalist Explanations for War", *International Organization*, emphasizes:**
 - (a) + incentives to misrepresent,**
 - (c) with commitment problems in a dynamic setting**
- **Note: same arguments apply to civil wars**

4. Why do people rebel?

- **Who would rebel against a social welfare maximizing govt.?**
 - **Are governments rationally optimizing with full information?**
 - **What's a predatory govt.?**
Depends on the welfare weights?
- **What types of organizations can rebel successfully?**

Literature: Income & Violence

Evidence:

- Income and violence are negatively correlated, except when they are not. Collier & Hoeffler 04, Fearon & Laitin 03, Miguel et al 04, Dube & Vargas 08, Blattman & Miguel 09, Benmelech, Berrebi and Klor 09, Condra 10.
- Grievances and violence are not correlated across countries, nor is ethnic heterogeneity and violence (Fearon & Laitin 03).

Explanations

- Opportunity cost (Becker): low wages predict crime in individual and regional data (Grogger 98, Gould et al 02, Raphael et al 01)
- Predation: (Grossman, Collier & Hoeffler 04, Fearon 08)
- Information-centric “Hearts and Minds” income proxies for good governance which induces noncombatants to share information (Mao 37, Akerloff & Yellen 94, US Army 06, Berman, Shapiro & Felter 11)
- Clubs: income proxies for good governance which undermines attraction of social service providing violent club (Berman & Laitin 08)
- Hobbesian: Income => taxes => suppression capacity
- Gratitude ?

Why do people rebel? Evidence on income

TABLE 2: PREDICTORS OF CIVIL WARS AND SUICIDE ATTACKS
BETWEEN COUNTRY REGRESSIONS

Dependent Variable	Civil War Onset (indicator) 1949-1999		Suicide Attacks 1949-1999		Suicide Attacks 1949-2003		Mean of RHS variable 1949-99 (std. dev.)
log(GDP/capita)	-0.011 (.003)	-0.010 (.002)	-0.004 (.011)	-0.003 (.011)	0.01 (.02)	0.01 (.02)	1.10 (1.03)
log(Mountains)		0.0044 (.0016)		0.005 (.007)		-0.0003 (.0139)	2.18 (1.40)
R ²	0.11	0.15	0.001	0.004	0.003	0.003	
N (Country-years)	6575	6575	6575	6575	7172	7172	
Countries	161	161	161	161	161	161	

Note: Heteroskedasticity-robust standard errors in parentheses. The mean of civil war onset is 0.017. The mean number of suicide attacks is 0.018 from 1949-99, and 0.046 from 1949-2003. The suicide attacks variable counts suicide attacks in a country-year, where the country is that of the perpetrators. Palestinians are coded in Israel. Results are qualitatively robust to the exclusion of Israel.

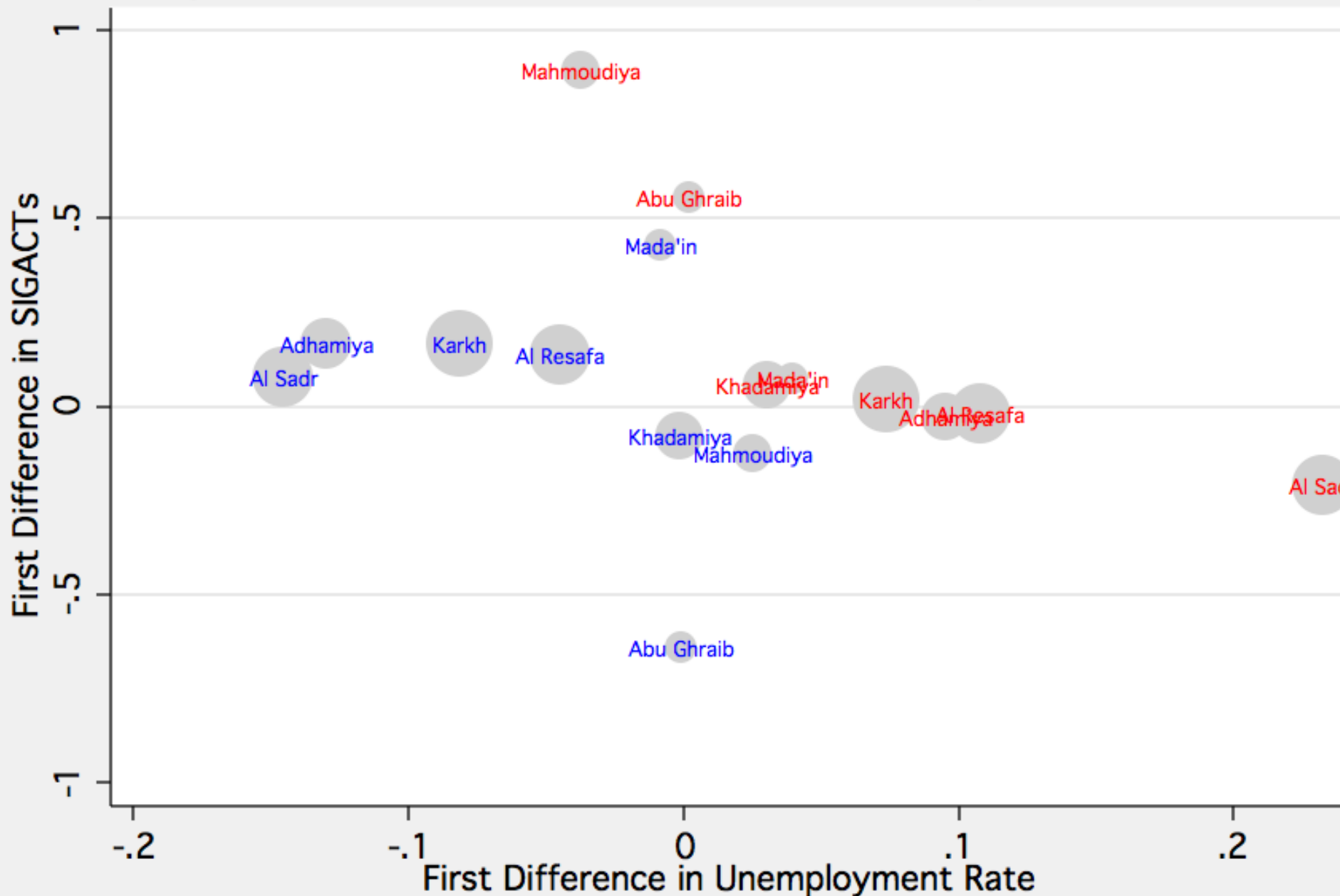
Nonemployment and Violence

Berman, Felter, Shapiro, Callen 2011

		Linear Regression			
DV		Incidents /1000	Incidents /1000	Incidents /1000	Incidents /1000
Region		All	Baghdad	All	Baghdad
Iraq (district/quarter)	Nonemployment	-1.307** (0.60)	-4.593** (1.67)	-1.204** (0.72)	-2.684** (1.04)
	Observations	312	27	312	27
	R-squared	0.23	0.37	0.76	0.78
	Controls	Ethnicity	Ethnicity	District FE	District FE
Region		All	Muslim > 5%	All	Muslim > 5%
Philippines (province/year)	Nonemployment	-0.075* (0.046)	-0.083 (0.31)	-0.087* (0.057)	-0.471* (0.28)
	Observations	228	36	228	36
	R-squared	0.46	0.27	0.88	0.88
	Controls	Ethnicity	Ethnicity	Province FE	Province FE
DV		AGE/1000	AGE/1000	JOHS/1000	CIDNE/1000
Afghanistan (district/month)	Nonemployment	0.032** (0.02)	-0.049 (0.04)	-0.063* (0.05)	-0.0495 (0.04)
	Observations	2,160	2,160	2,160	2,160
	R-squared	0.17	0.80	0.81	0.80
	Controls	Ethnicity	District FE	District FE	District FE

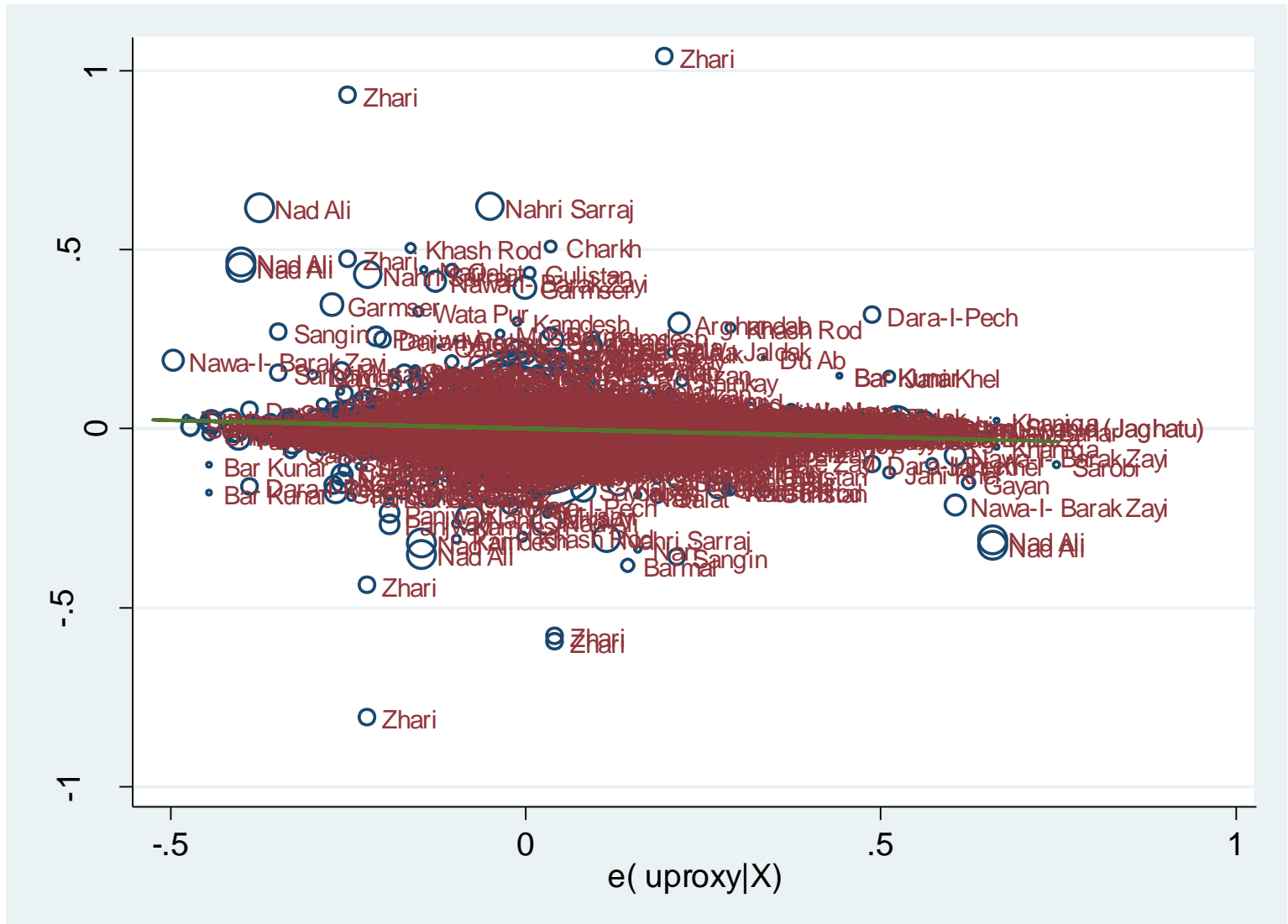
Note: All regressions include time/wave fixed effects. The Afghanistan sample has 5 waves of ANQAR data and all waves span two months, except wave 5 spanning one month (results are similar using wave-month fixed effects). Robust standard errors clustered by district/province reported in parentheses. *** $p < .01$, ** $p < .05$, * $p < .1$, one-tailed with $H_0 > 0$. Variables described in note to Table 1. Iraq has 104 districts, the Philippines has 99 provinces, and Afghanistan has 363 districts included in the samples above.

Figure S1 - Unemployment and SIGACTs in Badghad w/out Tarmia



04-05 in red, 05-07 in blue

Afghan Nonemployment and Violence



Note: Based on estimates reported in column (3) of Table 3.

5. Terrorist Clubs (Tactics I)

The Global War on Terrorism

Fatalities due to Terrorist Attacks Worldwide 1998-2006

	Fatalities	Fatalities / month
Pre 9/11 January 98 – August 01	4,800	109
Post 9/11 October 01 – September 06	10,000*	167*

Source: Memorial Institute for the Prevention of Terrorism, Oklahoma City, www.tkb.org

• Excluding casualties in Iraq and Afghanistan. Including those fatalities the 10/01 – 9/06 figure is 447 rather than 167.

• Note change in organizations threatening civilians and governments.

Prime Minister's Office, Algeria - 4/11/07



Hamas



Hamas 2006



Taliban



Hezbollah



Jewish Underground



Muqtada al-Sadr's Mahdi Army



A Violent Puzzle Among Religious Sects

The Violent Puzzles:

- Why are radical religious militias and terrorists so efficient at violence?

Hamas

Hizbullah

Taliban

Al Sadr

Al Qaeda

They make the secular terrorist organizations of the 60s-90s look lame

- Why Suicide Attacks?
- Our approach: Draw on
 - a) insurgency literature in IR,
 - b) economics/sociology of religion,
 - c) agency and collective action in organizations

What Motivates Terrorists?

The Afterlife and Other Myths

- **Is the advantage of radical religious terrorists due to the *superior motivation that stems from theology and beliefs?***
 - **An ideology of hate?**
 - **Promises in the afterlife?**
- **Israeli psychiatrist Ariel Merari has spent years interviewing suicide attackers, their families and friends.**
- **He finds that:**
 - **Hamas and Jihad suicide attackers *never* mention religion or virgins in heaven as their primary motivation**
- **Consistent with experience in other countries**
 - **many suicide attackers worldwide are *not religious radicals*, including the Tamil “Tigers” and the majority of attackers in Lebanon in the 1990s.**

So what *does* motivate suicide attackers?

- Merari finds that there is *no specific primary motivation*
 - not economic depravity,
 - not depressed or suicidal or mentally ill
 - consistent w/ research on Bader-Meinhoff, Red Brigade, ETA
 - not ignorant
 - generally not seeking revenge
- Might be best thought of as well adjusted *altruists*, who truly believe that their courageous act will help their communities
 - combination of altruism and delusions of self-importance
 - close to profile of rational recruits to sects; triage needed
- Now that's a *frightening thought*, because the world is full of self-motivated altruists who are willing to give their lives for some cause
 - and indeed there seems an ample supply of suicidal terrorists
- A *reassuring thought*: few terrorist organizations sustain.
Why?

Organizations and Tactics:

Suicide Attacks as a Rebel Tactic

- **Civil wars 1945-1999 (Fearon-Laitin)**
127 in 69 countries
directly account for 16m fatalities
- **Rebel tactic is usually rural insurgency**
- **Suicide attacks are very rare,**
but becoming more common

Table 1: Suicide Attacks by Country of Perpetrator

PANEL A: CIVIL WARS AND SUICIDE ATTACKS

	1945-1999	2000-2003
Countries with new Civil War	69	na
Countries whose residents perpetrated Suicide Attack	9	7

Table 1: Suicide Attacks by Country of Perpetrator

PANEL B: SUICIDE ATTACKS BY COUNTRY

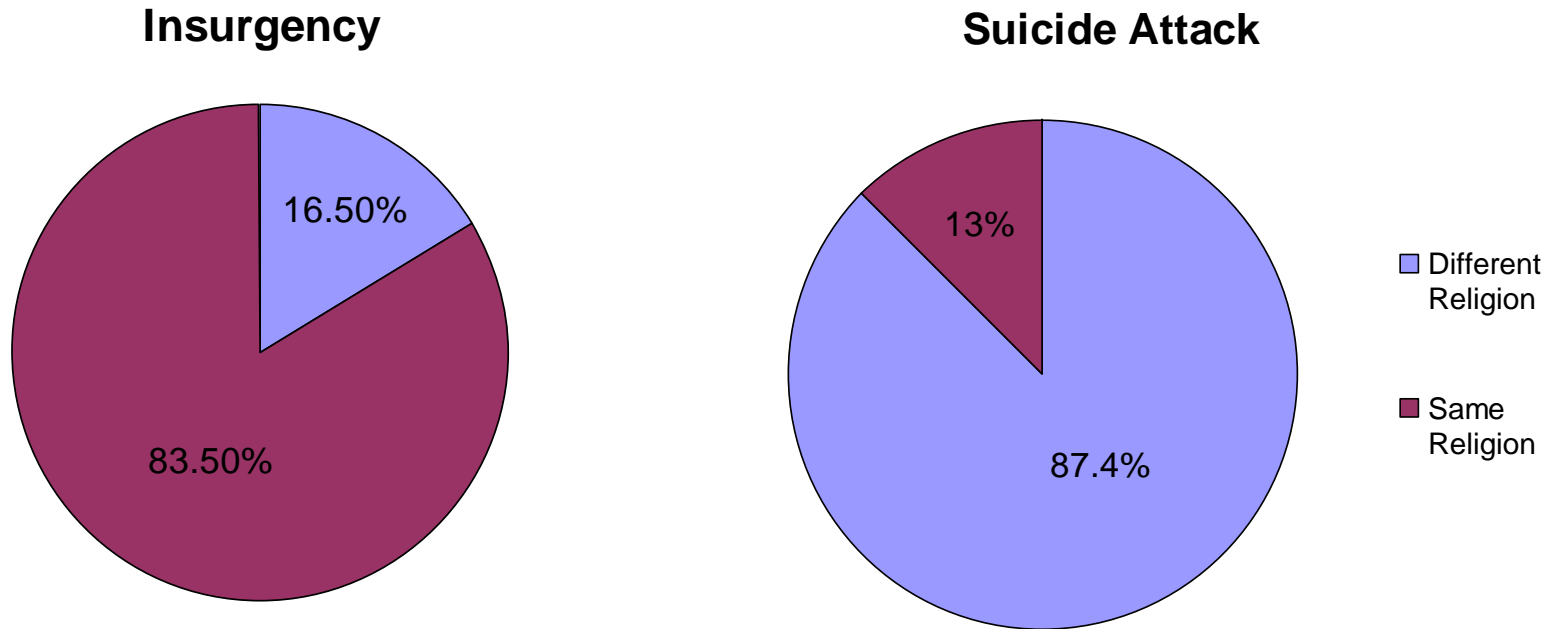
COUNTRY	SUICIDE ATTACKS 1946-1999	SUICIDE ATTACKS 2000-2003
Sri Lanka	66	21
Lebanon	44	0
Israel / Palestine	23	123
Turkey	14	0
Saudi Arabia	3	6
Egypt	1	0
Algeria	1	0
Pakistan	1	0
Syria	1	0
Iraq	0	20
Russia	0	20
India	0	5
China	0	1
TOTAL	154	196

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Religious Differences between Insurgents (Suicide Attackers) and Targeted Victims



Unlike civil wars, this is the *only* consistent predictor.
Why?

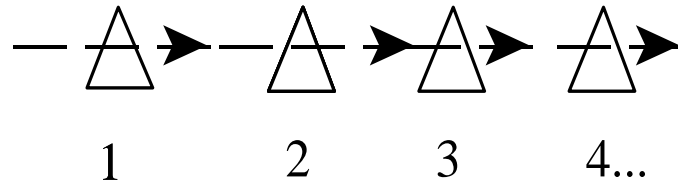
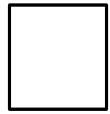
Terrorist Clubs vs. Hard Targets

Rebel activity - Coordinated rent captured involving violence.

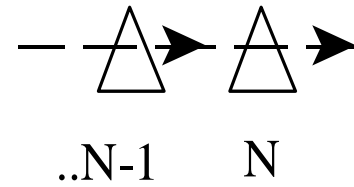
- **e.g. attacking occupying army, providing law and order, organizing and carrying out a clandestine activity (like terrorism).**
- **often involves personal risk.**
- **Key aspect is *sensitivity to defection*.**

A. Securing a Trade Route

Convoy



Checkposts



Destination



\$B

Securing a Trade Route

$$C(\{R_i\}) = C\left(\prod_{i=1}^N R_i\right)$$

Convoy will choose to set out only if all $R_i = 1$.

Payoffs: Club extracts surplus B and shares it equally among members, who buy goods at price P .

Benign local public goods provided by govt., G and club, A .

Defector's outside option is w_i , but no access to C or A .

Incentive compatibility: Member loyal iff

$$(ICC) \quad U\left(\frac{B}{N}, 1, G \cup C(1) \cup A(\bar{R})\right) \geq U(B \cup w_i, 0, G)$$

Securing a Trade Route

$$C(\{R_i\}) = C\left(\prod_{i=1}^N R_i\right)$$

If ICC fails this is an N player prisoner's dilemma, resulting in an unsafe route, no convoy and no rents.

Adverse selection:

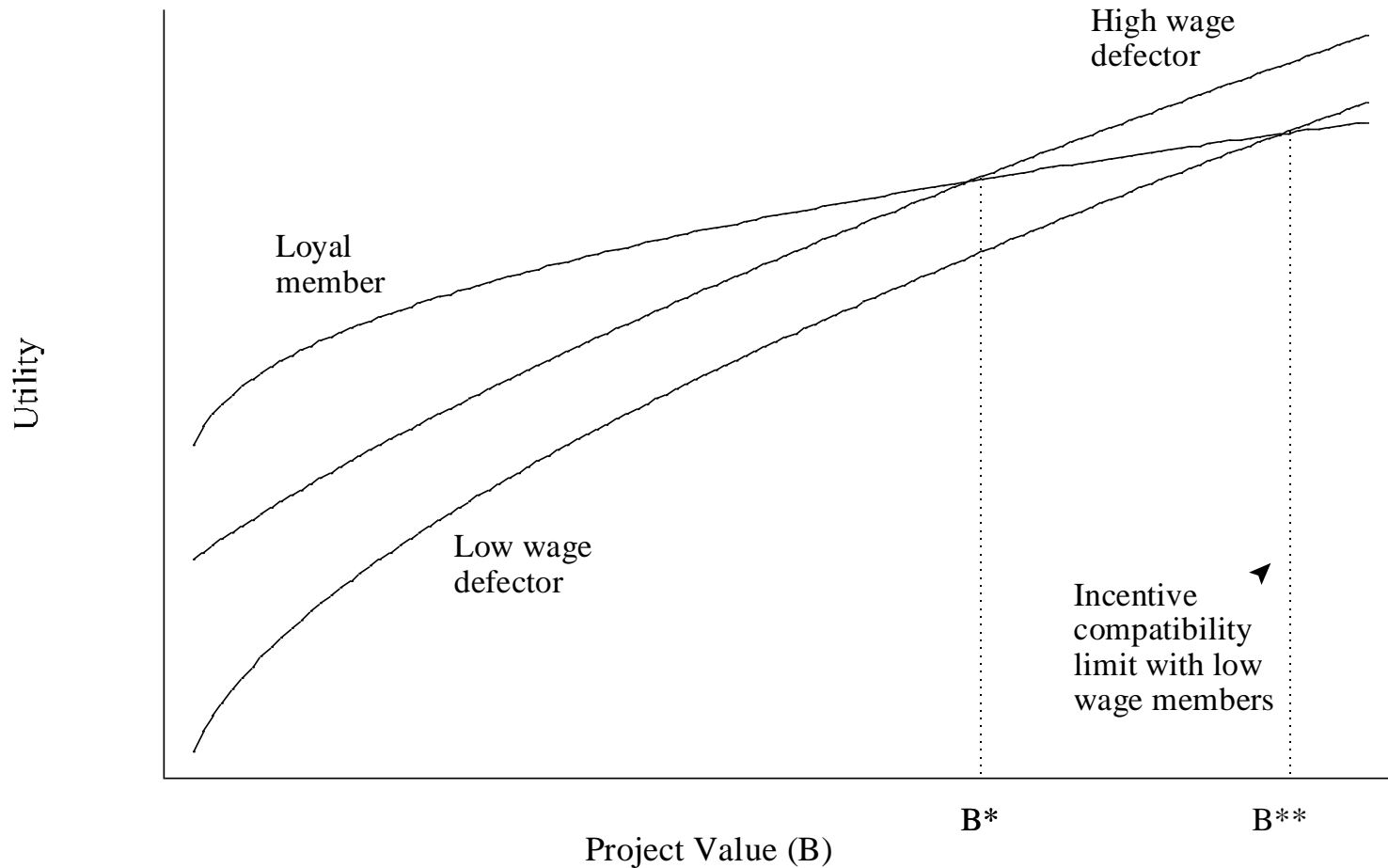
Imagine two unobserved types (as above), such that ICC holds if $w_i = w^H (> w^L)$ for all i .

A club with a costly sacrifice as an initiation rite which successfully excludes all low wage types can secure the route and extract the rent.

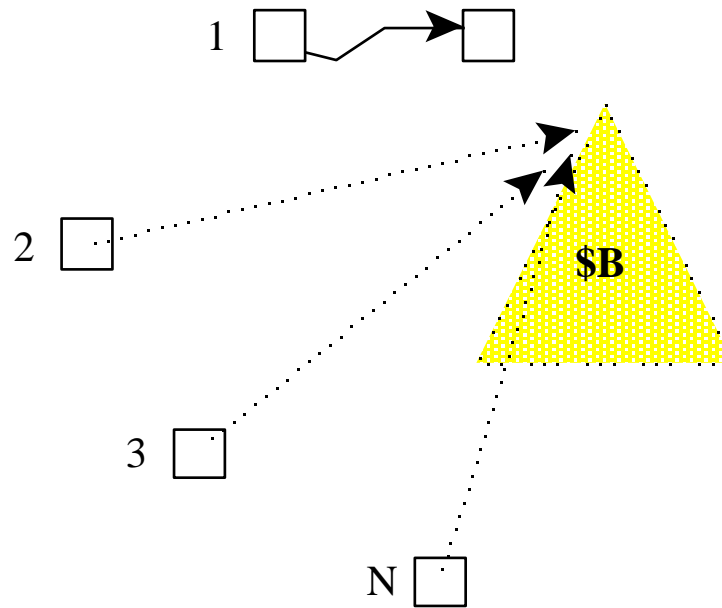
E.g., The Taliban

$$(ICC) \quad U\left(\frac{B}{N}, 1, G - C(1) - A(\bar{R})\right) \succ U(B - w_i, 0, G)$$

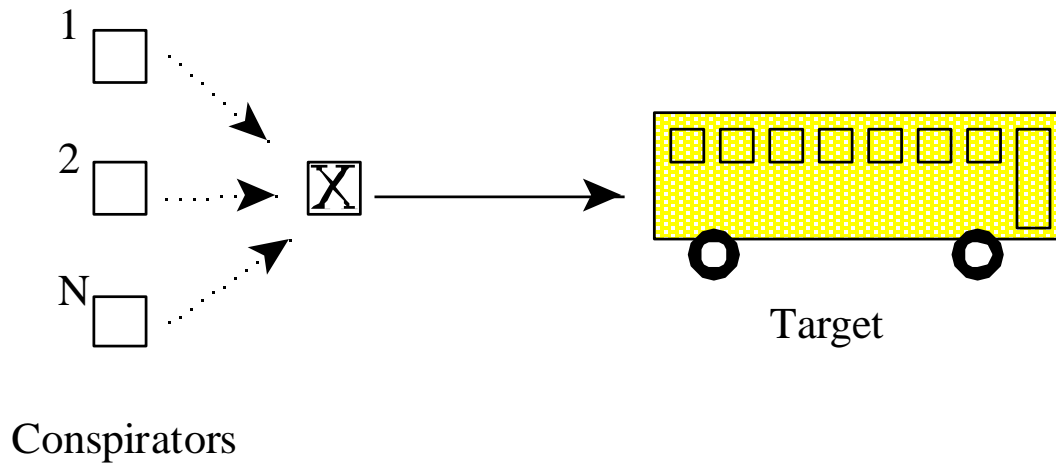
Selecting Low Wage Membership Allows Larger Projects



B. Capturing a Hill



Clandestine Violence



Defection – The reason so few militias and terrorist organizations survive.. *defection is common.*

How do successful militias and terrorist organizations prevent defection?

They have an *organizational advantage.*

Remember an analogous problem?

Reducing free riding in Religious Sects

- **Sect – a religious group that:**
 - **imposes extreme prohibitions and requires distinctive sacrifices**
 - **views secular society as corrupt, dangerous, and threatening**
 - **economic life: high levels of mutual aid, and local public goods provided through volunteer work, e.g. education, health care, law and order, welfare services, orphanages, day care, soccer clubs**

How can you trust members to apply full effort?

- **Internal economies of sects rely on trust-based transactions**
 - **sacrifices are elicited early in life to signal commitment**
e.g., education, missionary work, jail time
 - **prohibitions distance members from market culture**



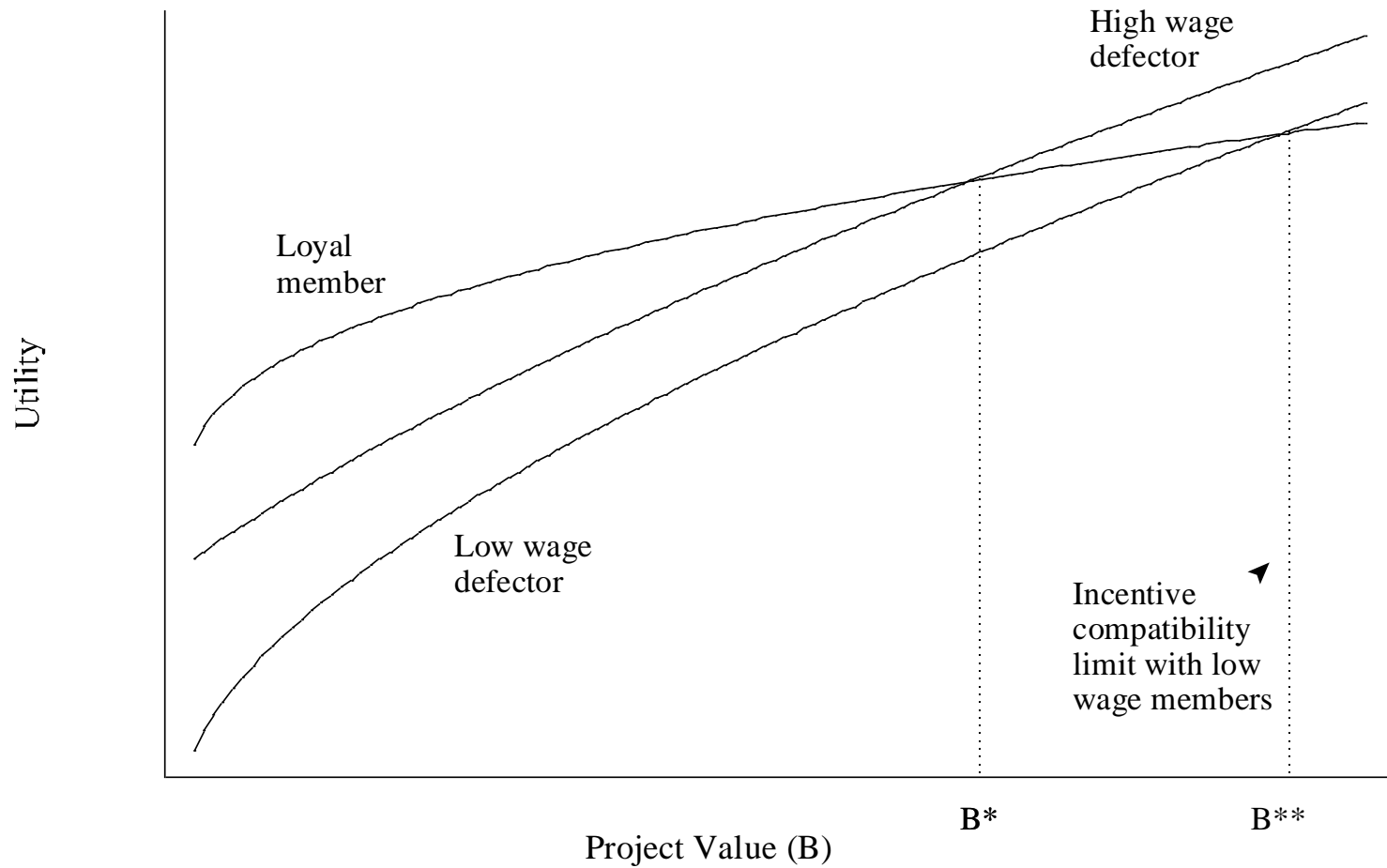
Analogy: Military unit as a Club

- **Like a sect, a unit is involved in cooperative production, i.e., participants benefit from their own effort *and* the average effort of other members.**
- **A good soldier/member comes prepared, trains, works hard, covers his/her buddies, would never defect.. because they are *devoted*.**
- **Lacking a way to subsidize devotion, the unit would like to**
 - a) tax outside activity of members,**
 - b) select devoted members.**

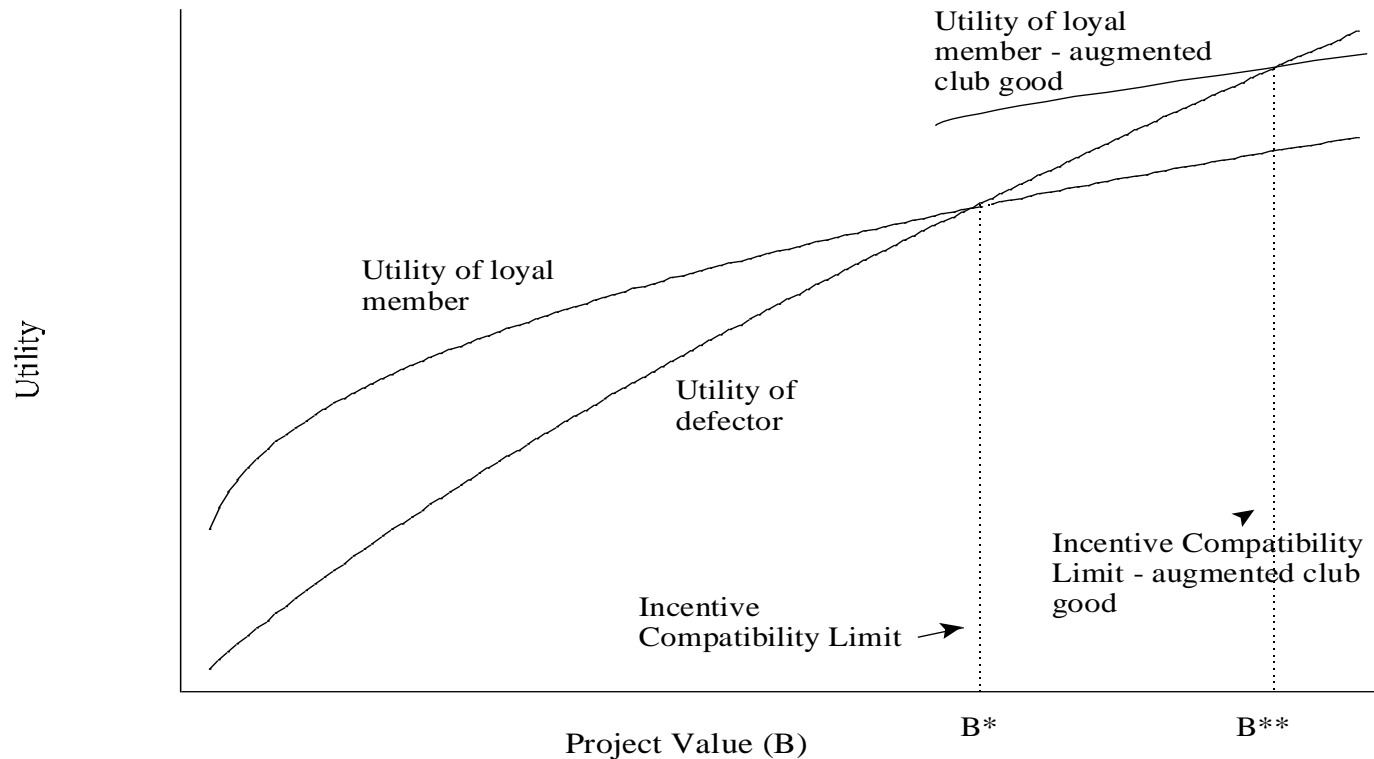
Why are sects effective at violence?

- **Recall that militias and terrorist groups are organizations extremely sensitive to defection**
- **Sects have a strong advantage at coordinated violence because their benign service provision activities help them**
 - a) **select operatives unlikely to defect**
 - b) **influence operatives through their support of friends and family**
- **Testable implication: a sect will be more effective the stronger its' social service provision**

Selecting on Low Wage Membership Allows Larger Projects



Benign Activity Increases a Militia's Potential



(ICC)
$$U\left(\frac{B}{N}, 1, G + C(1) + A(\bar{R})\right) > U(B + w_i, 0, G)$$

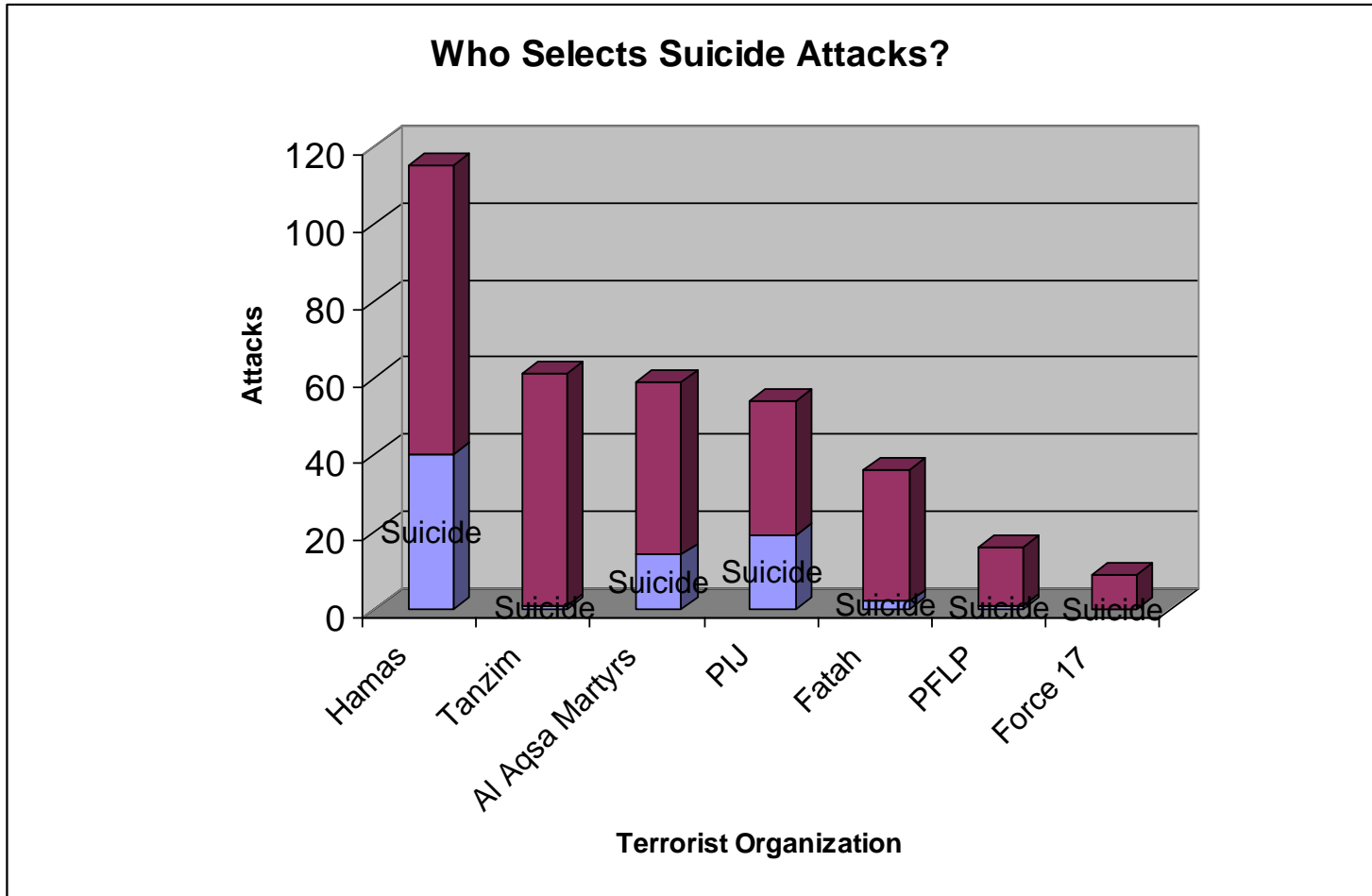
Resolving the Puzzle

- **Taliban, Hamas, Hizbullah, Sadr's Militia are all examples of remarkably effective violent radical Islamic organizations which started out as classic sects providing social services.**
- **Cooperative production of social services has the same "free-rider" problem, though less extreme**
e.g., mutual insurance is sensitive to defection
- **An organization designed to limit defection in a benign context will have a huge advantage in the cooperative production of violence**

$$(ICC) \quad U\left(\frac{B}{N}, 1, G + C(1) + A(\bar{R})\right) > U(B + w_i, 0, G)$$

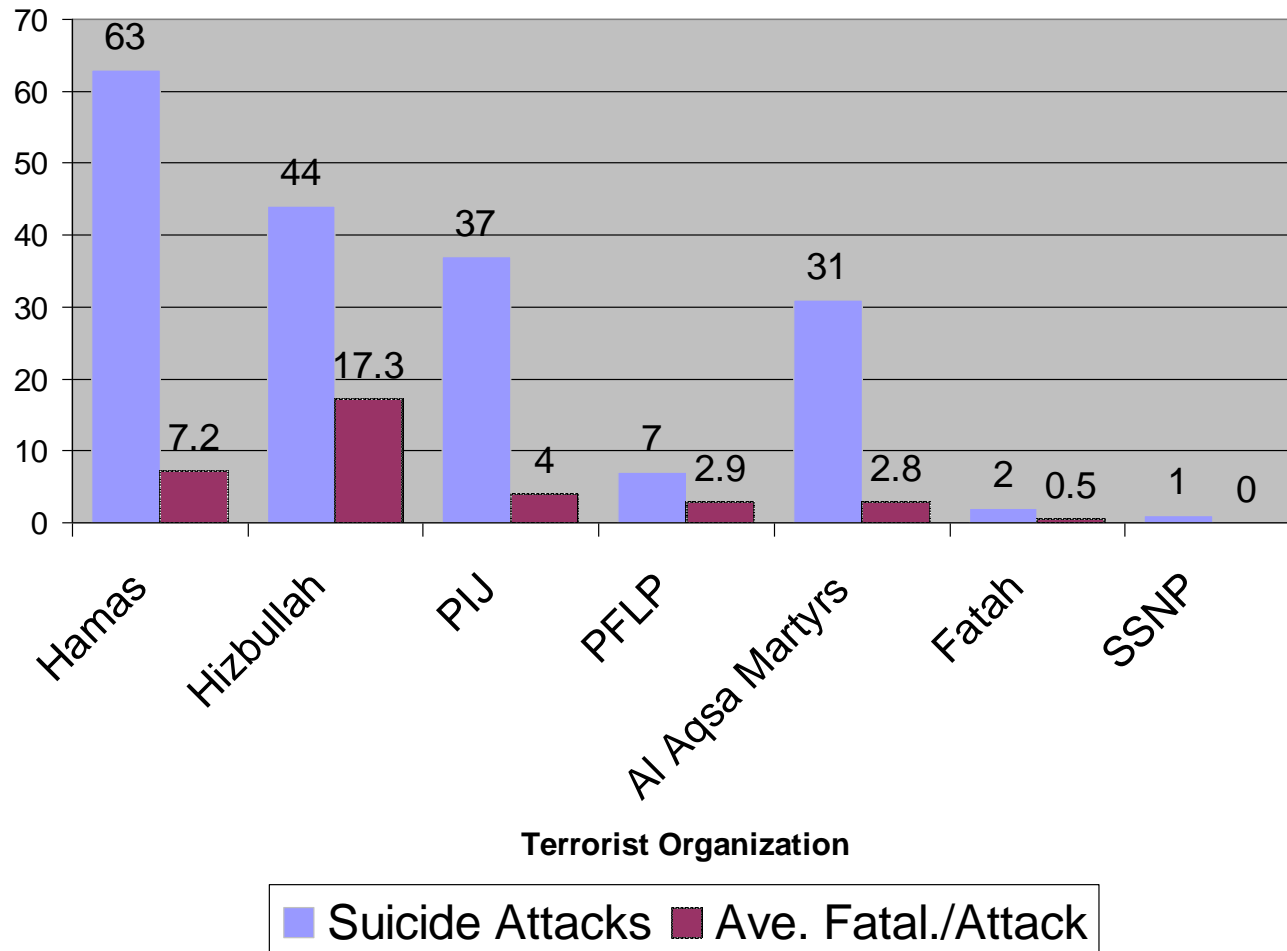
**TABLE 4: SOCIAL SERVICE PROVISION AND LETHALITY OF TERRORIST ATTACKS
ISRAEL AND LEBANON: 1968-2006**

Group name	Attacks	Injuries	Fatalities	Injuries per attack	Fatalities per attack	(std. error)
<i>Hamas</i>	70	2202	413	30.2	5.9	0.87
<i>Hezbollah</i>	90	387	449	4.3	5.0	2.82
Palestinian Islamic Jihad	38	722	111	12.7	2.9	0.81
Popular Front for the Liberation of Palestine	38	376	107	9.9	2.8	1.03
Fatah/PLO	131	1465	279	11.20	2.1	0.48
Democratic Front for the Liberation of Palestine	21	240	22	10.4	1.0	0.37
Unknown	427	1055	351	2.2	0.8	0.28
<i>Social Service Providers: Hamas and Hezbollah</i>	160	2589	862	15.8	5.4	1.62
Others: DFLP, Fatah/PLO, PIJ, PFLP	228	2632	519	11.6	2.3	0.35
Difference					3.1	1.67*



Suicide attacks are so damaging that only defection proof organizations can succeed at them. Most do not try.

Lethality of Suicide Attacks in Israel and Lebanon



Implications

Violent radical religious groups thrive where..

- **a) govt. provision of local public goods is weak**
 - **Somalia, Nigeria, Pakistan, Algeria, Lebanon, Afghanistan, Palestine, Iraq**
- **b) local militias are popular..**
 - **Chechnya, Afghanistan during war, Kashmir, Palestine, Jordan (“Black September”), Palestine, Iraq**
- **c) wages are low..**
 - **all of the above,**
- **d) where outside subsidies are available,**
 - **Kashmir, Lebanon, Palestine, Afghanistan, Iraq**

Suicide Attacks, Terrorism and Insurgency

- **Why suicide attacks?**
- **Deadliest method of delivering explosives to a target**
 - **precise**
 - **leaves no operative to interrogate**
- **Method of choice vs. “hard” targets i.e., targets whose destruction implies a high probability of death or capture**

Hard Targets

- $p(h)$ – probability of apprehension increases in govt. investment in “hardening” target
- Expected utility, loyal operative, conventional attack..

$$(7a) \quad [1 - p(h)] U\left(\frac{\alpha D}{N}, 1, G + B(1) + C(\bar{R})\right).$$

where D is damage, benefit B is proportional to D

- Utility from defection:

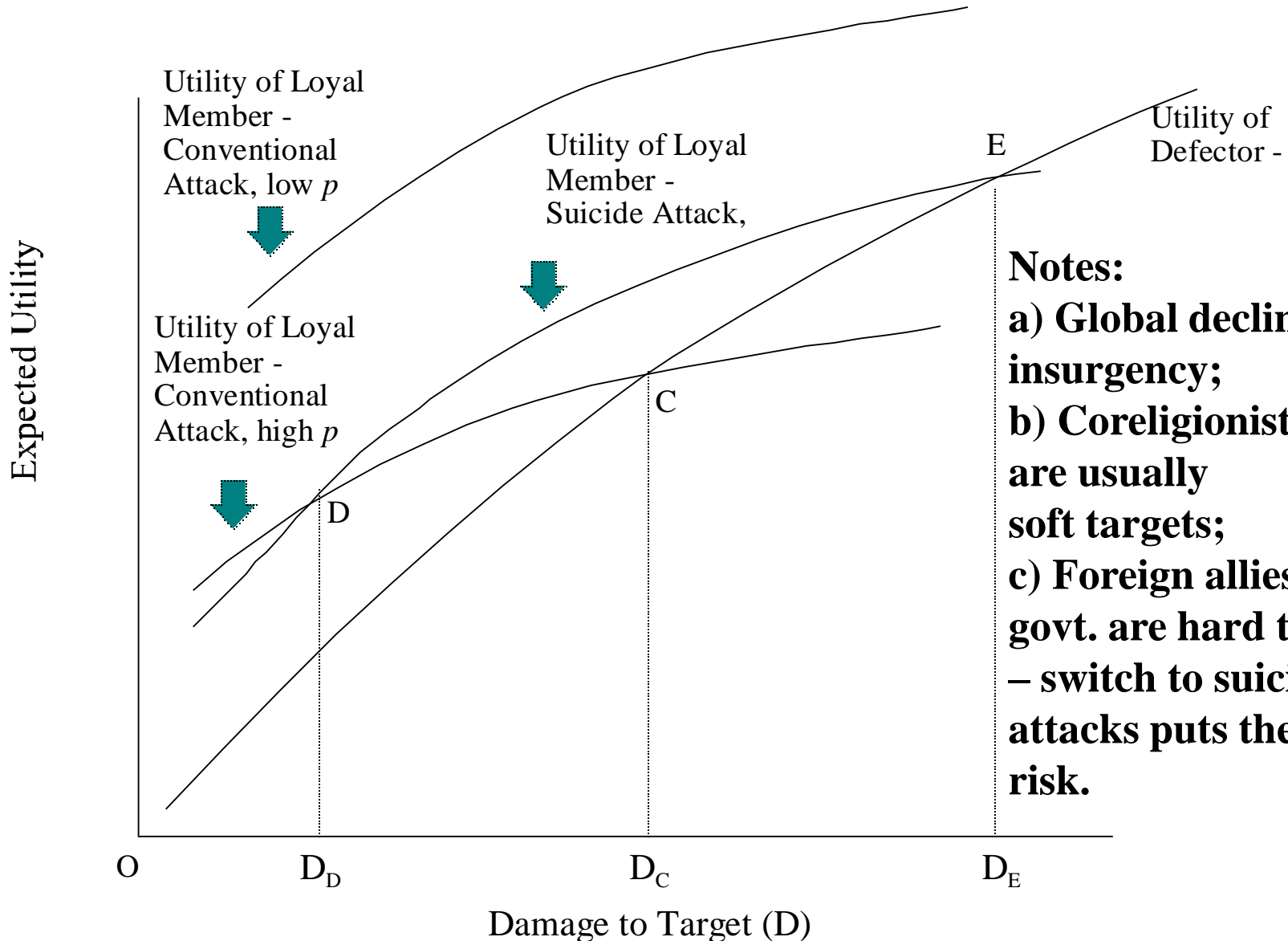
$$(7b) \quad U(D + w_l, 0, G).$$

- Utility from suicide attack:

$$(7c) \quad U\left(\frac{\alpha D}{N}, 1, G + B + C(\bar{R}) - Z\right).$$

- Choose suicide attack if $(7c) > (7a)$, $(7c) > (7b)$

Strong Governments Harden Targets, Rebels respond with Suicide Attacks



Notes:

- a) Global decline in insurgency;
- b) Coreligionists are usually soft targets;
- c) Foreign allies of govt. are hard targets – switch to suicide attacks puts them at risk.

**TABLE 5: ATTACKS ON ISRAELI RESIDENTS
BY LOCATION AND TACTIC**

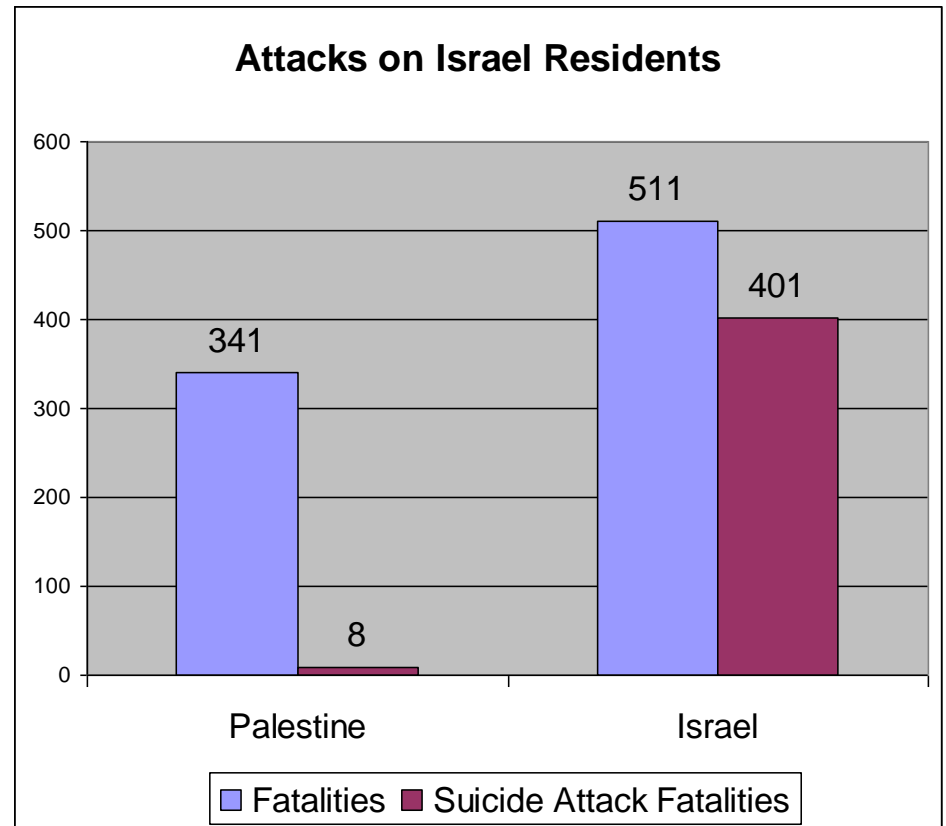
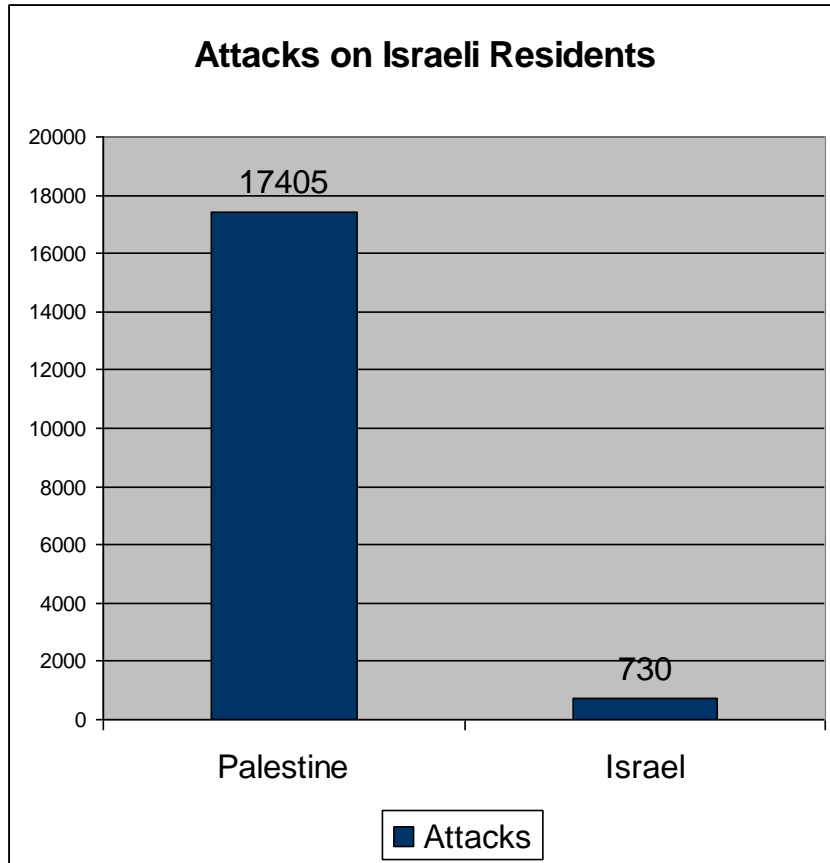
Sept 2000 through July 2003

Location	Attacks	Fatalities	(of which) Suicide Attack Fatalities	Fatalities/ attack	Suicide attack fatalities / attack
West Bank and Gaza	17405	341	8	0.020	0.00046
Inside Green Line	730	511	401	0.700	0.54932
Difference (std. error)	16675	-170	-393	-0.680 (0.017)	-0.54886 (0.05460)

Note: Standard errors are calculated by treating the expected number of fatalities per attack as a probability and assuming that attacks are independent.

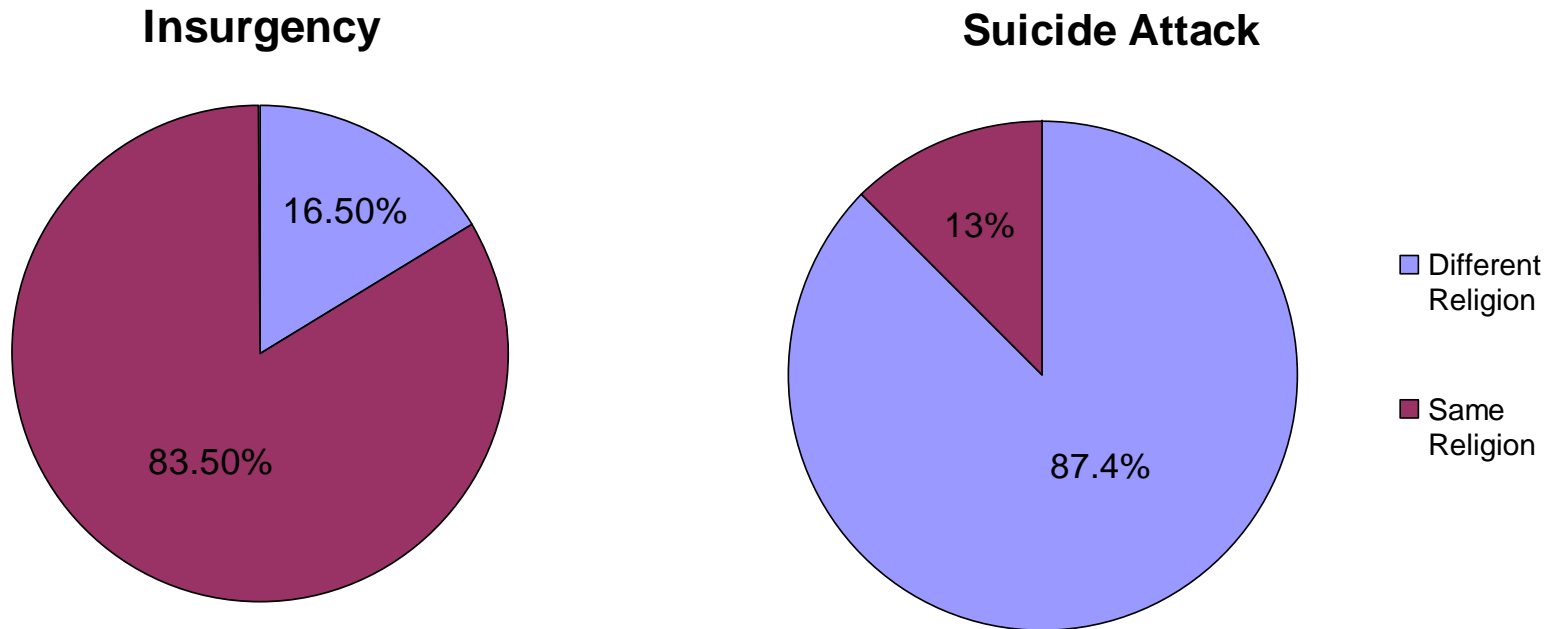
Sources: Attacks, fatalities and fatalities due to suicide attacks inside green line are from the Israel Defense Forces spokesperson's office, as reported by Nadav Shragai in Ha'Aretz, September 26, 2003. Fatalities in West Bank and Gaza due to suicide attacks are from the ICT data for that period described in the Appendix.

Attacks on Israelis by Location and Tactic



Why? Because targets in Palestine are soft, whereas targets in Israel are hard.

Religious Differences between Insurgents (Suicide Attackers) and Targeted Victims (Table 3)



What about this? Coreligionists are soft targets.

Coreligionists are soft targets

- **Insurgents and terrorists often target coreligionists: political rivals, members of rival militias, collaborators, targets of extortion.**
- **They seldom use the suicide tactic to do so..**
- **.. probably because it's not necessary. A coreligionist assailant can defeat profiling.**
- **Exception are target well defended by means beyond profiling: e.g., Sadat, Massoud, Rajiv Ghandi.**
- **When members of other religions have similar appearance suicide attacks are not used: N. Ireland.**

Application: Jewish Underground

- **Violent militia which drew members from Gush Emumin, a messianic settler movement but a weak sect, (weak prohibitions and sacrifices).**
- **Began settling illegally in West Bank in mid 1970s.**
- **- vigilante activity had local public good aspect**

- **After Camp David (I) agreements frustrated settlers organized conspiracy to destroy Muslim holy sites on Temple Mount / Haram A-Sharif.**
- **- project aborted for lack of rabbinical authorization.**

Why the Increase in Suicide Attacks?

- **.. Because of the decrease in viable options for insurgents**
- **Insurgents attempt conventional tactics first, including against coreligionists. When these fail they turn to suicide attacks, generally reserving them for “hard” targets.**
- **As governments improve at counterinsurgency we will see more terrorism and suicide attacks**
 - **directed against both local targets and allies of govt.**

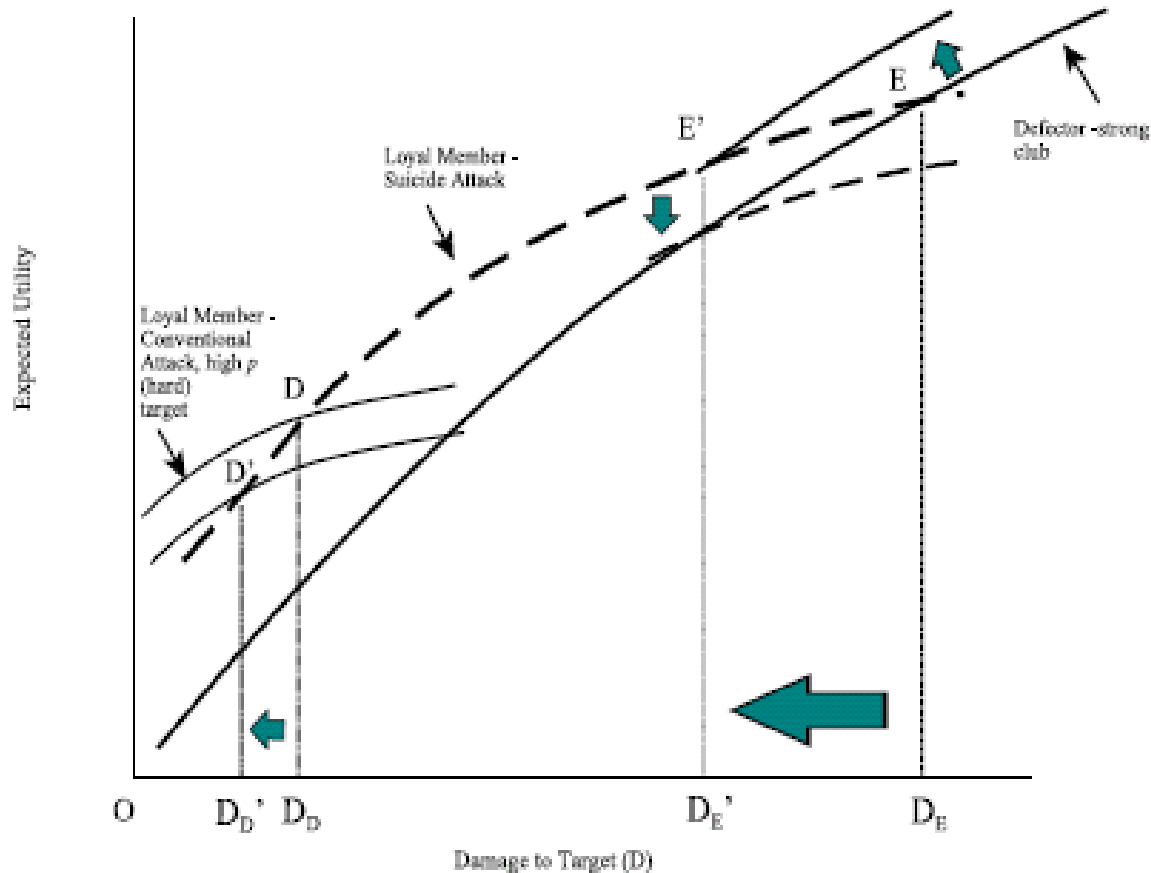


Figure 6: Protecting High Value Targets

Once suicide attacks are being used, constructive intervention operates at that margin

Conclusions

- ***Why so few terrorist organizations?***
Defection constraint.
- ***Why are religious radicals effective terrorists?***
Solve defection constraint in benign activities.
Not necessary theology.
- ***Why suicide attacks?***
Hard targets.
- ***What to do about it?***
Compete in providing benign services and competent governance, with muscular protection.
- ***Future Work***
Need research and evaluation

Distinguish club model from standard “rational peasant” approach to “winning hearts and minds”

Mosque and State – Implications for Policy

Activity can be rationalized, so incentives matter, which implies that subtle instruments could work.

Subtle Policies: Governments, Economic Rents and Markets

- A. Improve Provision of Local Public Goods by Secular Governments
- the Kilcullen / Petraeus / SOC approach***
- B. Fiscally Separate Church and State if that Government is Radical Religious
- so that it cannot lock itself into power (Smith vs. Hume)***
- C. Reduce Rents Available to Militias and Smugglers
- e.g., demand for Heroin, Cocaine and Oil***
- D. Improve Market provision of substitutes to club goods.***

Rational Choice Matters

- **Can this fit in a rational choice model?**
 - **is that model helpful in predicting behavior?**

- **Policy implication:**
 - **can the shift to militia activity be reversed?**
 - **does behavior respond to incentives?**
 - **what could we recommend if it did not?**

6. “Hearts and Minds”

Motivation: Development in Insecure Environments (mostly insurgencies)

- **How can economic development parallel provision of security, or succeed in the absence of security?**
- **Three major theories link economic development to violence:**
 - **Information-centric counterinsurgency (Mao, US Army)**
 - **Predation (Collier, Fearon)**
 - **Opportunity costs (Becker)**
- **Evidence mixed on #2 & #3 (Blattman & Miguel)**



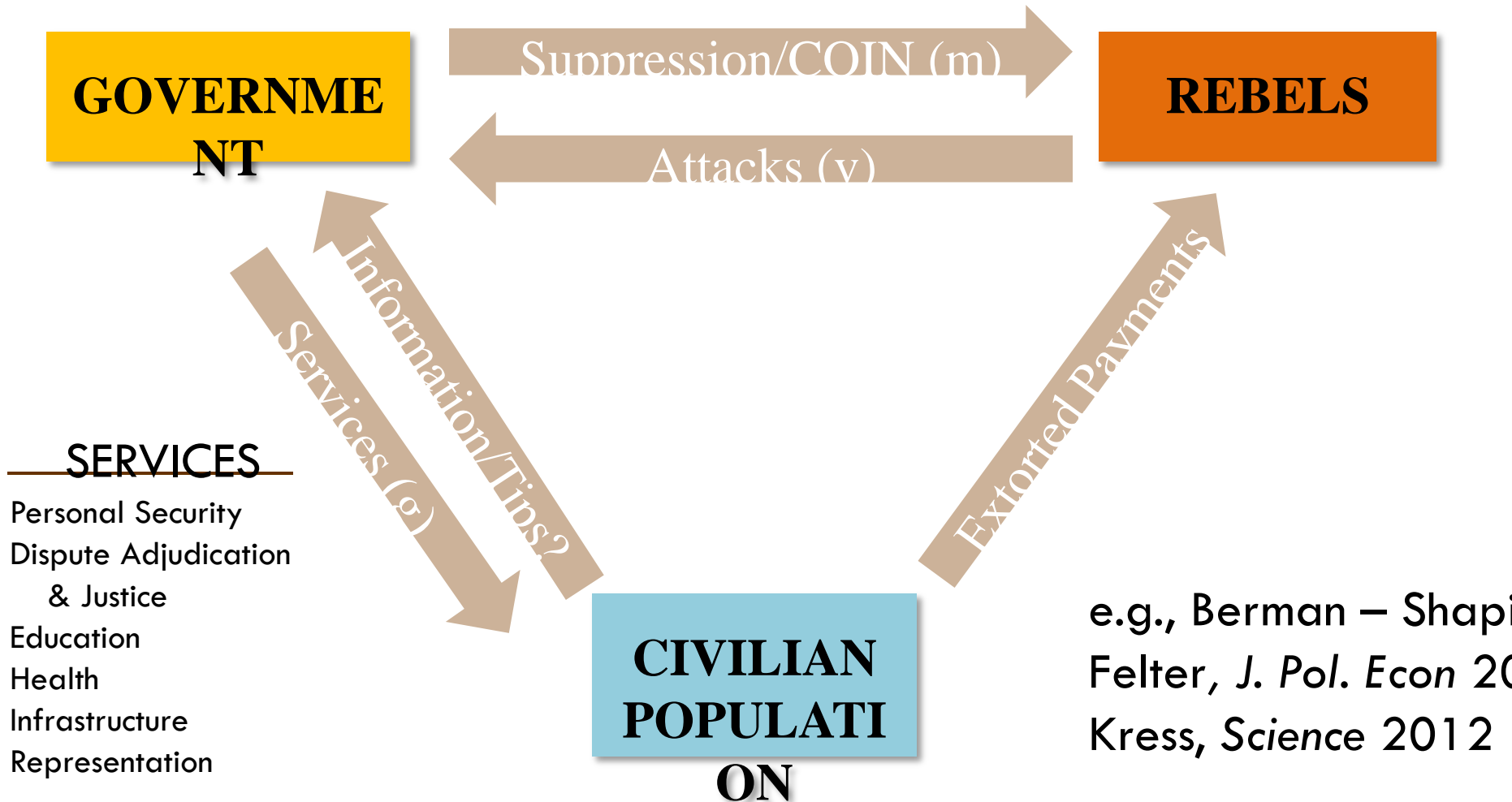
“Hearts and Minds”

(Tactics II)

- **Three way game between insurgents, government, and noncombatants**
- **Noncombatants make the consequential choice of whether to share information with government about insurgents, which decides who controls their neighborhood**
- **Insurgents choose level of violence**
- **Government chooses level of coercive force, and public good provision**
- **Model is a variation on Akerloff and Yellen (1994) on gangs**
- **Tested with Iraqi data on reconstruction spending and violent incidents, 2004-2008**

Theory:

Counterinsurgency as a Three-sided Contest



COIN Model Motivation

- Operating procedure of U.S. and Allied Special Forces includes providing local public goods:
 1. Control some territory
 2. Ask population what services they want
 3. Provide them
 4. Ask population for information on insurgents
 5. Use information to ambush or capture insurgents, allowing control of more territory
 6. Repeat (1) – (5) until entire country is controlled

Akerloff-Yelen (94) Gang Model

Motivation

- Gangs are limited by “norms” of behavior
 - People share information with police about gang only when gang transgresses certain boundaries
 - If the parents complain that a member is selling drugs in a primary school, the member is disciplined by the gang

- “...now I understand that if you ain’t got the community with you, it’s just a matter of time before you got to close up shop.”
 - *Duck (the gang member who learned his lesson)*



Setting v^* in AQI



“Stop the killing of people unless they are spying, military, or police officers....if we continue using the same method, people will start fighting us in the streets....

You have to come with Dr. ‘Amir the day after tomorrow early in the morning....It is important that you and Dr. ‘Amir have to come to me as soon as possible...”

- Letter to Abu-Usamah, Ramadi cell leader from senior leader in al-Qa’ida in Iraq. Early 2006.

The Kilcullen Approach

“23. Practise armed civil affairs. Counterinsurgency is armed social work; an attempt to redress basic social and political problems while being shot at. This makes civil affairs a central counterinsurgency activity, not an afterthought.”

“You need intimate cooperation with inter-agency partners here, national, international and local. You will not be able to control these partners . Many NGOs, for example, do not want to be too closely associated with you because they need to preserve their perceived neutrality.”

“Thus, there is no such thing as impartial humanitarian assistance or civil affairs in counterinsurgency. Every time you help someone, you hurt someone else . not least the insurgents. So **civil and humanitarian assistance personnel will be targeted.”**

Source: **“Twenty-Eight Articles: Fundamentals of Company-level Counterinsurgency” (2006)**

Lt. Col. David Kilcullen, Ph.d. in Political Anthropology, Australian advising the Pentagon

Overview

- Background & Motivation
- Theory & Testable Implications:
Complementarities between Development Spending, Force Strength and Development Expertise
- Data: Development Programs & Violence in Iraq
- Results
- Conclusions

Who wins control?

The probability of government control is given by

$$P(a=1) = h(m)i ,$$

where m is violence mitigation (counterinsurgency) effort by G,

$h(m): \mathbb{R}^+ \rightarrow [0,1]$ is a monotonically increasing, concave contest success function, with $h(0)=0$ and $h \rightarrow 1$ as $m \rightarrow \infty$.

Rebels & Govt.

- **Rebels choose v to maximize**

$$EU_R(v,a) = E[A(v)(1-a) - B(v)] = A(v)(1-p) - B(v),$$

where $p \equiv h(m) E(i)$,

$A(v)$ are costs imposed on government by violence, and $B(v)$ is the cost of generating violence

- **Government chooses m and g to maximize**

$$EC_G(v,m,g,a) = E[A(v)(1-a) + D(m) + H(g)] = A(v)(1-p) + D(m) + H(g).$$

Community

Choose level of information sharing, i , to maximize

$$EU_c(g, v, n, p) \Big|_n = u(c + g - n) h(m) i + u(c - v)(1 - h(m) i).$$

- $g \geq 0$ is the level of govt. provided local public goods,
- $v \geq 0$ is violence,
- $n \geq 0$ is the norm of noncooperation.
- Note that g only counts if govt. wins control

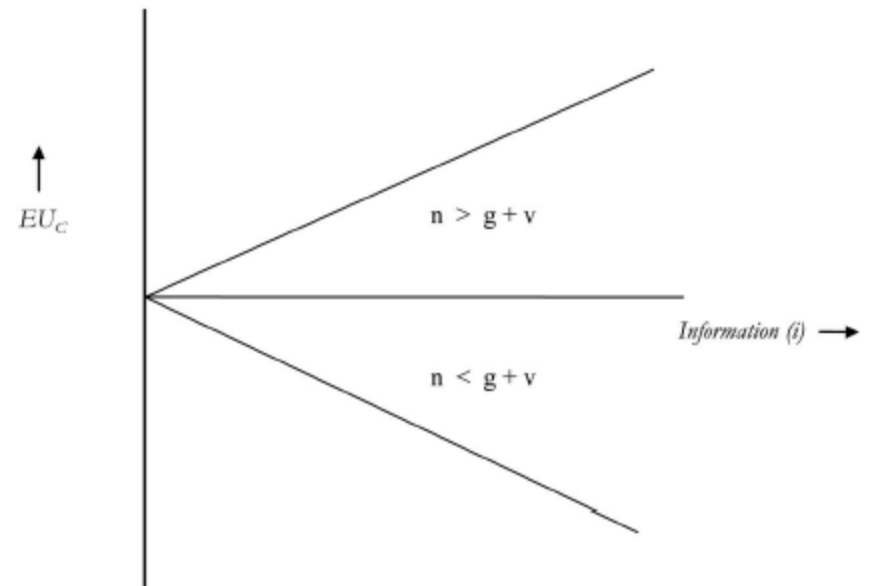
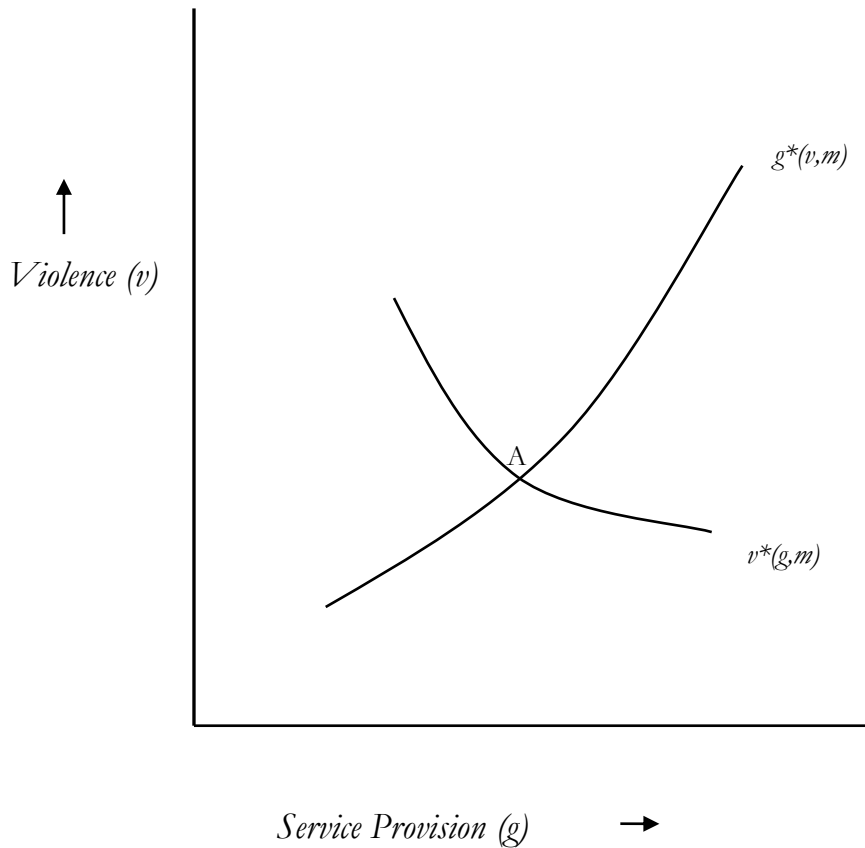


FIG. 2.—The utility of a noncombatant community from sharing information

Sequence of Play

1. Nature draws community norms (n)
 - observed only by community
2. Govt chooses g and m ; Rebels choose v ;
3. Community chooses information-sharing (i) .
4. Uncertainty resolved over control of territory
 $P(a=1) = h(m) i$.
Payoffs occur.

Best Response Functions of Government (g^*) and Rebels (v^*)

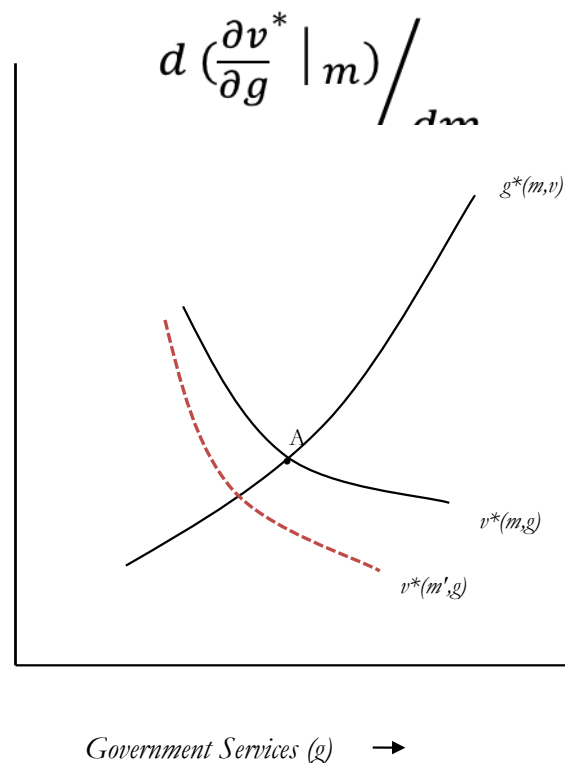
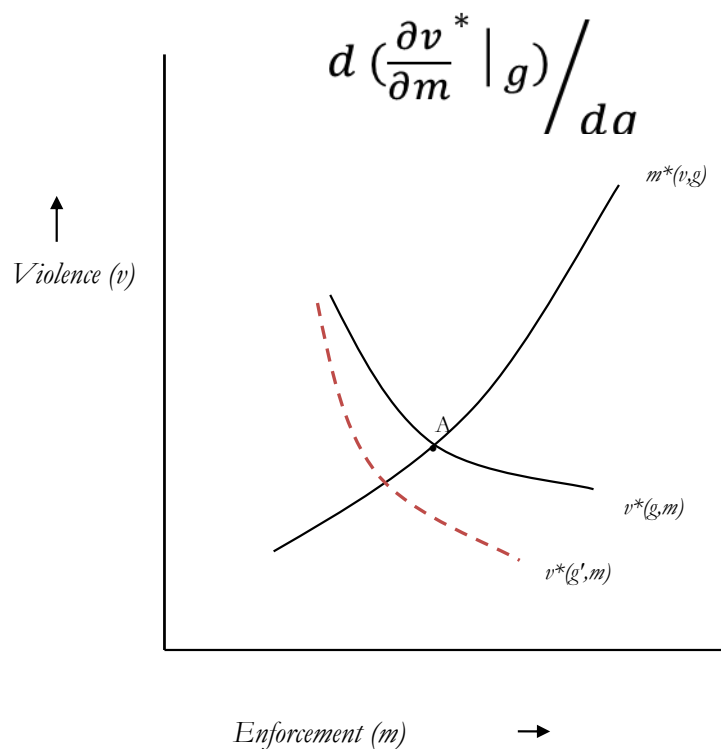


Testable Hypotheses Applied to Iraq

- H_1 : Variables that predict violence will also predict small-scale reconstruction spending ($dv^*/dg^* > 0$)
Yikes... Selection bias!
- H_2 : Small-scale reconstruction spending will cause lower violence ($\partial v^*/\partial g < 0$)
.. Estimate by controlling for selection on rebel strength and other community characteristics

$$\Delta v_n = \delta_i + \beta \Delta g_n + \gamma' \Delta z_n + \phi \Delta v_{n-1} + \Delta \varepsilon_n$$

Complementarity of g and m



Services Complement Enforcement
in Reducing Violence

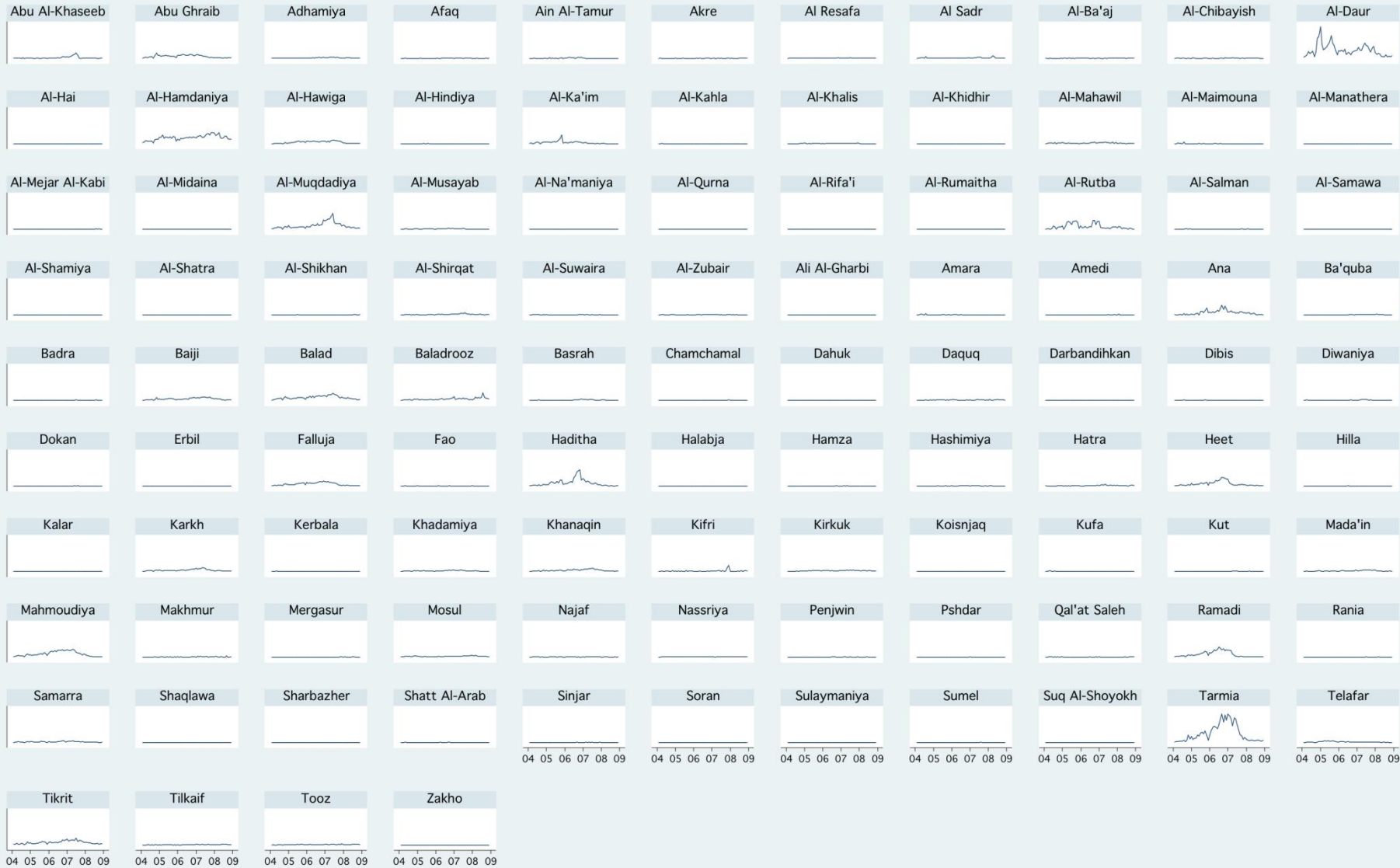
Enforcement Complements Services
in Reducing Violence

Implications

1. Security and development are complements
2. More utility-increasing development programs are more violence-reducing
3. Development must be conditional (on govt. control) to be violence-reducing

Trends in Violence Across Iraq

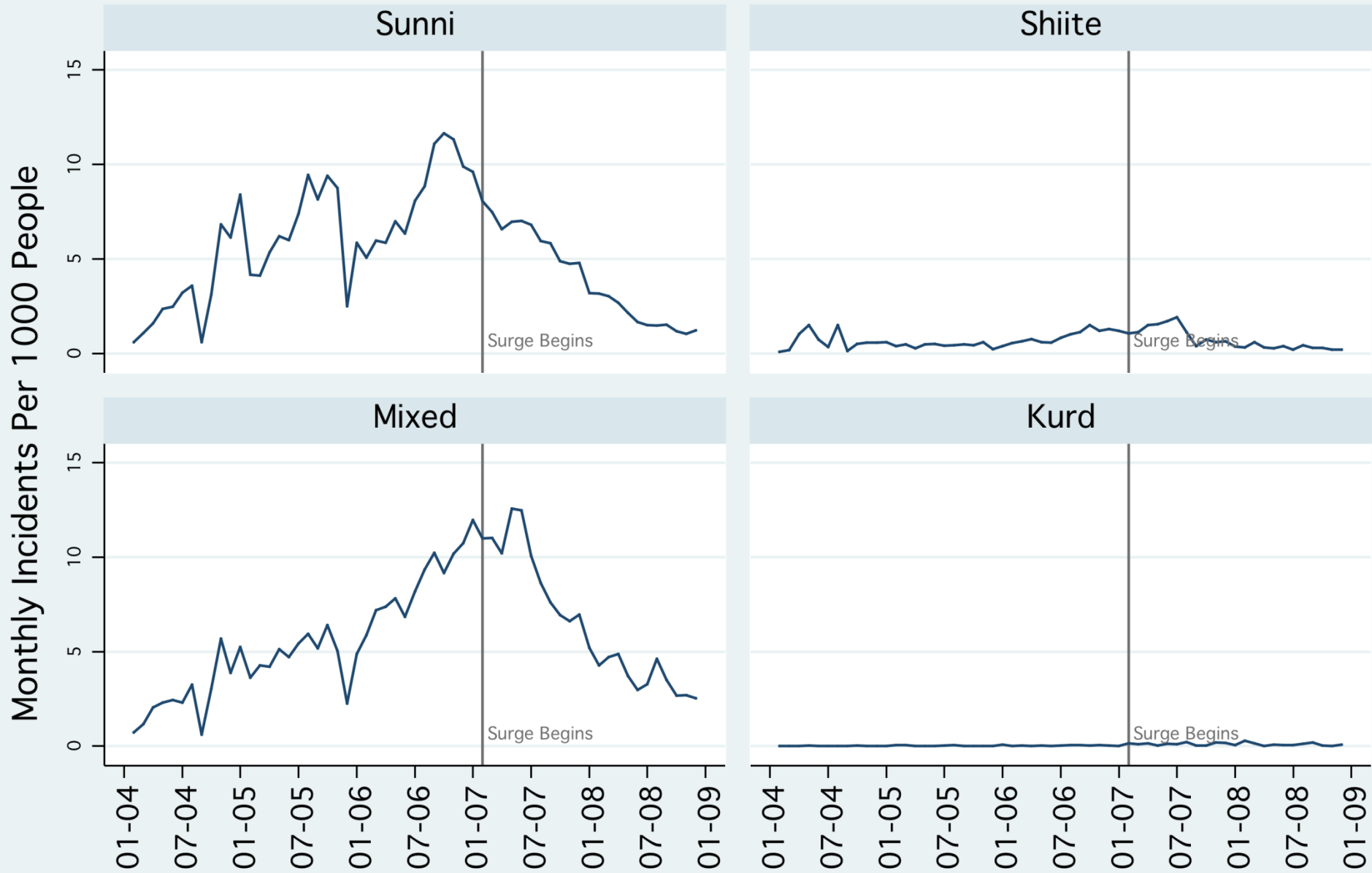
Monthly Incidents Per 1000 Population



MONTH

February 2004-December 2008

Trends in Violence by Sectarian Mix



Results from Iraq: CERP

TABLE 4
VIOLENT INCIDENTS ON CERP SPENDING, 2004–8

	INCIDENTS PER 1,000					
	(1)	(2)	(3)	(4)	(5)	(6)
Basic controls		Y	Y			
Time controls			Y	Y	Y	Y
First differences				Y	Y	Y
Preexisting trend (Δv_{t-1})					Y	Y
District-specific trends						Y
CERP per capita	.0213*** (.004)	.0147*** (.0038)	.0115*** (.0040)	-.00945** (.0043)	-.0111** (.0043)	-.0110** (.0046)
Preexisting trend (Δv_{t-1})					.195** (.080)	.192** (.087)
Constant	.961*** (.085)	.906** (.13)	.262** (.10)	.217*** (.046)	-.124*** (.041)	.0890** (.042)
Observations	1,040	1,000	1,000	936	832	832
R^2	.08	.25	.33	.17	.21	.21
Mean squared prediction error (10-fold coefficient of variation)	3.52	3.05	2.81	4.77	4.95	5.25

NOTE.—Robust standard errors are in parentheses, clustered by district. Results are robust to clustering by governorate instead. Regressions are weighted by estimated population. Basic controls include sect, unemployment, and income variables (as in table 3). Time controls include year indicators and their interaction with Sunni vote share (as in table 3). District-specific trends are district effects in a differenced specification. Basic controls are dropped from first-differenced specifications since they do not vary on a semiannual basis.

Development, Security, PRTs in Iraq

	Obs	Weight	Mean	Std. Dev.	Min	Max
Incidents	927	246754372	-0.0025253	0.7192714	-14.30548	9.791145
Lagged Incidents	824	221459256	0.0246278	0.7529446	-14.30548	9.791145
Commander's Emergency Response Program (CERP)	927	246754372	0.8975824	11.75703	-252.7587	264.7626
CERP < \$50K	927	246754372	0.0978531	2.637987	-43.8516	34.17538
CERP > \$50K	927	246754372	0.7997293	10.81382	-252.7587	302.5766
Non CERP	927	246754372	-2.044234	79.77404	-10735.33	892.7099
Non Cerp < \$100,000	927	246754372	-0.1364265	1.977181	-45.27344	14.09699
Non CERP >\$100,000	927	246754372	-1.907807	79.62294	-10724.78	892.3289
Community Action Program (CAP)	927	246754372	0.0339391	0.6284991	-8.891963	16.47236
Community Stabilization Prg (CSP)	927	246754372	0.0539443	2.029424	-18.23231	29.00582
USAID	927	246754372	-1.833554	72.81415	-10757.88	66.87154
PRT	927	246754372	0.0503777	0.2188411	0	1
Troop Strength	927	246754372	-0.008259	0.6462308	-3	2.333333
Lagged Troop Strength	824	221459256	-0.0033438	0.645426	-3	2.333333
CERP x Troop Strength	927	246754372	1.71061	37.70935	-512.5932	725.2957
CERP < \$50,000 x Troop Strength	927	246754372	0.1375683	12.52012	-165.8702	93.96977
CERP>\$50,000 x Troop Strength	927	246754372	1.573042	29.48188	-482.8429	729.1677
CSP x Troop Strength	927	246754372	0.0700144	7.186853	-74.87498	77.8888
CERP < \$50,000 x PRT	927	246754372	0.0390839	1.764686	-25.60038	18.19453
CERP > \$50,000 x PRT	927	246754372	0.4654902	6.177386	-80.17256	58.67921
CSP x PRT	927	246754372	0.0228998	1.721804	-13.36795	14.78048

Notes: An observation is a district (N=103) x half year. District Karkh is excluded as national CSP programs are confounded with local there. Means are in changes, weighted by population. Regressions include NT=824 observations. Incidents are measured per 1000 population, spending variables are per capita. Troop strength is measured in battalions per district.

Development Programs and Violence in Iraq

Dependent Variable:	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
Incidents per capita								
CERP		-0.0122** (0.00562)						
CERP < \$50K			-0.0639*** (0.0186)					
CERP > \$50K				-0.0108* (0.00559)				
Non CERP > \$100K					0.000899 (0.000565)			
Non CERP < \$100K						0.00636 (0.0228)		
CSP							-0.0470* (0.0242)	
CAP								-0.0118 (0.0279)
USAID								-0.00248 (0.00334)
Observations	824	824	824	824	824	824	824	824
R-squared	0.215	0.222	0.204	0.180	0.179	0.194	0.179	0.180

Robust standard errors in parentheses
 *** p<0.01, ** p<0.05, * p<0.1

Complementarity of m & g

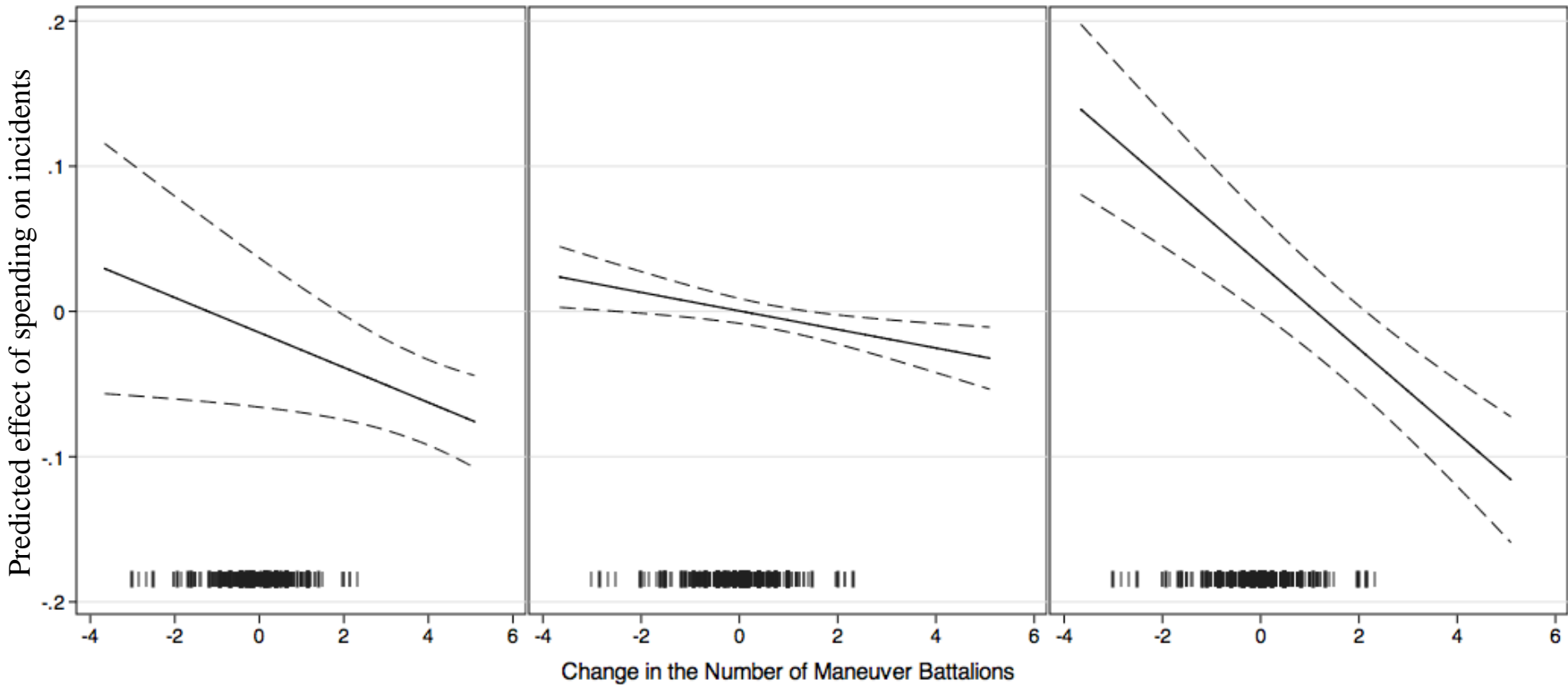
Dependent Variable:	(1)	(2)	(3)	(4)	(5)	(6)
Incidents	Troop	Levels		Troops	per	capita
CERP < \$50K	-0.0145 (0.0262)			-0.0447*** (0.0157)		
CERP < \$50K x Troops	-0.0120** (0.00542)			-0.0140 (0.0155)		
CERP > \$50K		0.000353 (0.00438)			-0.0122** (0.00565)	
CERP > \$50K x Troops		-0.00639*** (0.00228)			0.00120 (0.000752)	
CSP			0.0325* (0.0172)			0.0146 (0.0187)
CSP x Troops			-0.0291*** (0.00480)			-0.102** (0.0422)
Troops	0.0655* (0.0389)	0.136** (0.0517)	0.0746* (0.0393)	0.229 (0.284)	0.112 (0.270)	0.245 (0.252)
Lagged Troops	0.0106 (0.0607)	-0.0335 (0.0684)	-0.0164 (0.0693)	-0.493 (0.370)	-0.537 (0.370)	-0.613* (0.355)
Observations	824	824	824	824	824	824
R-squared	0.231	0.231	0.217	0.234	0.223	0.225

Security Complements Development

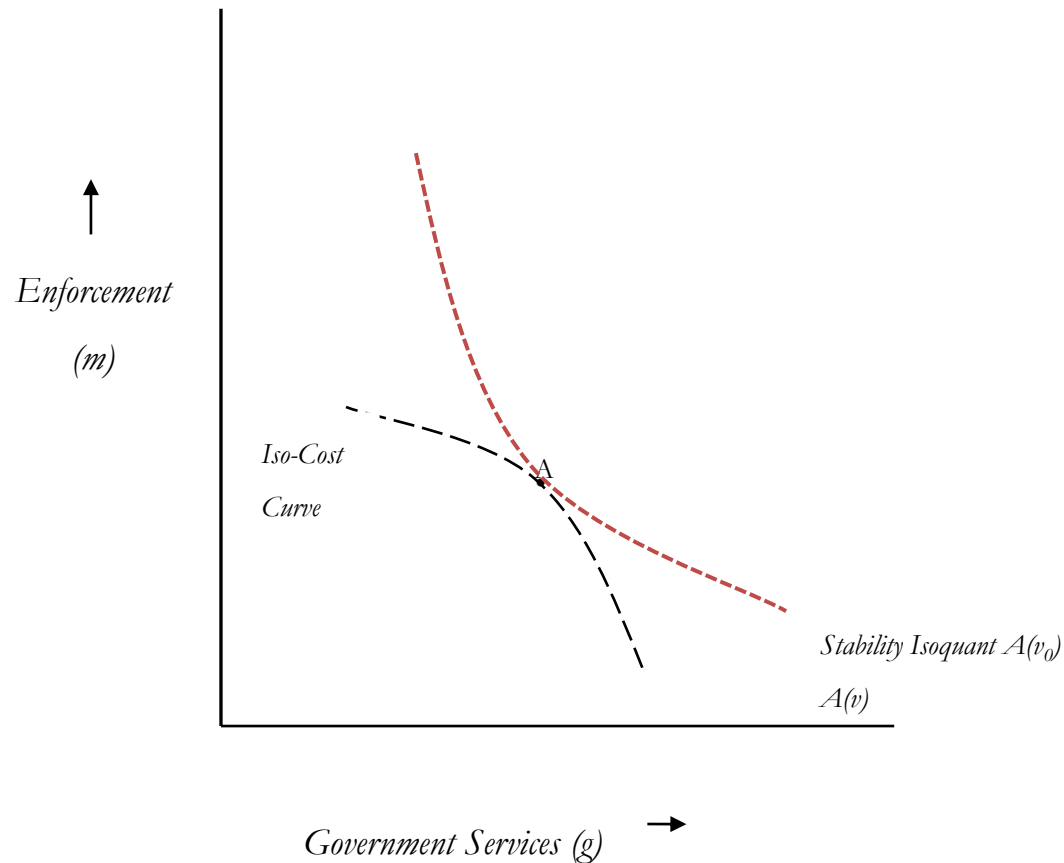
Small CERP Spending

Large CERP Spending

CSP Spending



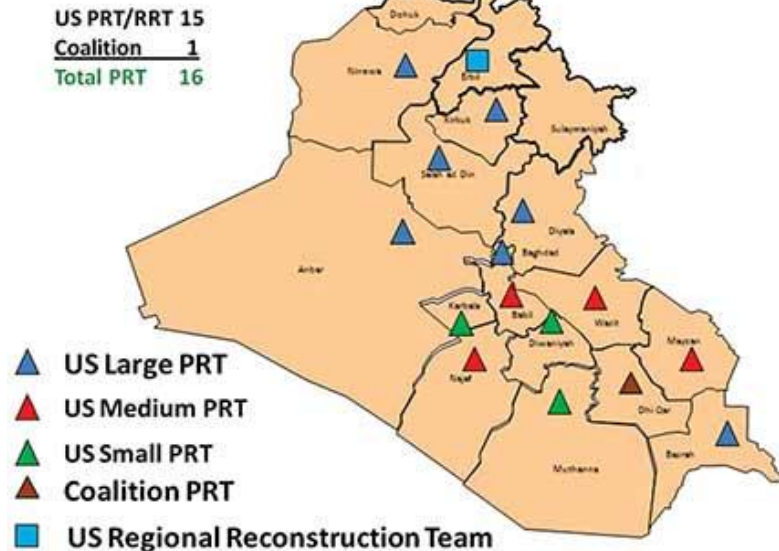
Complementarity and Resource Allocation for Stability



Provincial Reconstruction Teams

- A unit devoted to economic and political development
- Co-commanded by a military officer and a civilian expert
 - Troops, development experts (USAID/DFID/CIDA), agricultural specialists, lawyers & governance experts
 - Coordinates between m, g, local government and

PRT Size and Locations



Locations
Ninewa
Kirkuk
Babil
Baghdad
Anbar
Basrah
Dhi Qar (IT)
Salah ad Din
Diyala
Erbil
Wasit
Najaf
Karbala
Diwaniyah
Muthanna
Maysan



PRTs Complement Development Programs

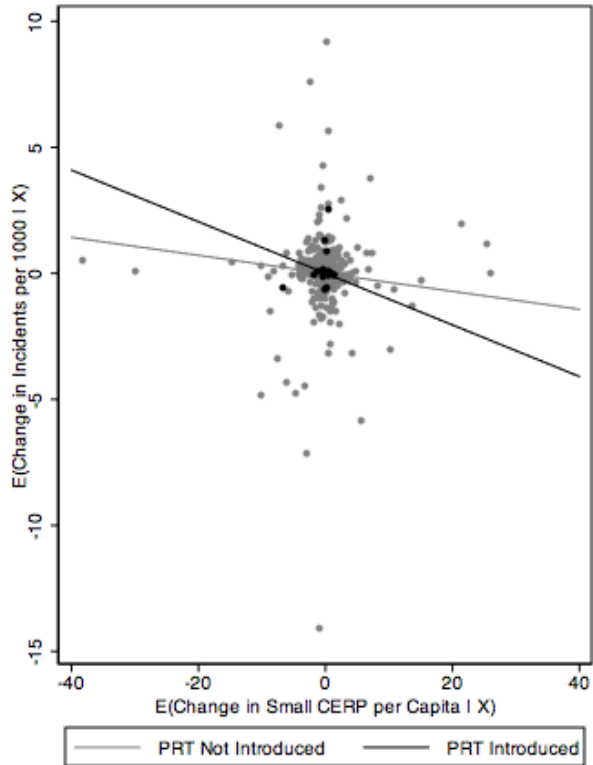
Dependent Variable: Incidents	(1)	(2)	(3)	(4)	(5)	(6)	Variable Mean
CERP		-0.0122** (0.00561)	-0.00672 (0.00472)				\$10.07
CERP x PRT			-0.0172* (0.00912)				\$3.84
CERP < \$50K				-0.0357** (0.0174)			\$1.32
CERP < \$50K x PRT				-0.0667*** (0.0176)			\$0.42
CERP > \$50K					-0.00594 (0.00476)		\$8.75
CERP > \$50K x PRT					-0.0164* (0.00958)		\$3.42
CSP						-0.0222 (0.0152)	\$0.44
CSP x PRT						-0.0354 (0.0397)	\$0.31
PRT	-0.0136 (0.0829)	-0.0228 (0.0822)	0.137 (0.131)	0.0750 (0.0885)	0.109 (0.121)	-0.00337 (0.0840)	0.29
Observations	824	824	824	824	824	824	
R-squared	0.179	0.216	0.233	0.236	0.217	0.196	

Robust standard errors in parentheses

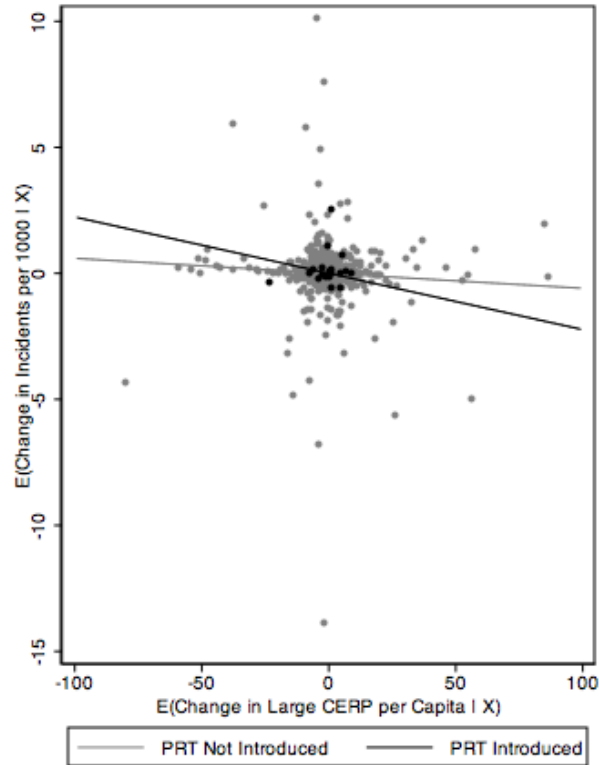
*** p<0.01, ** p<0.05, * p<0.1

Effects of Spending on Violence Upon Introduction of a PRT

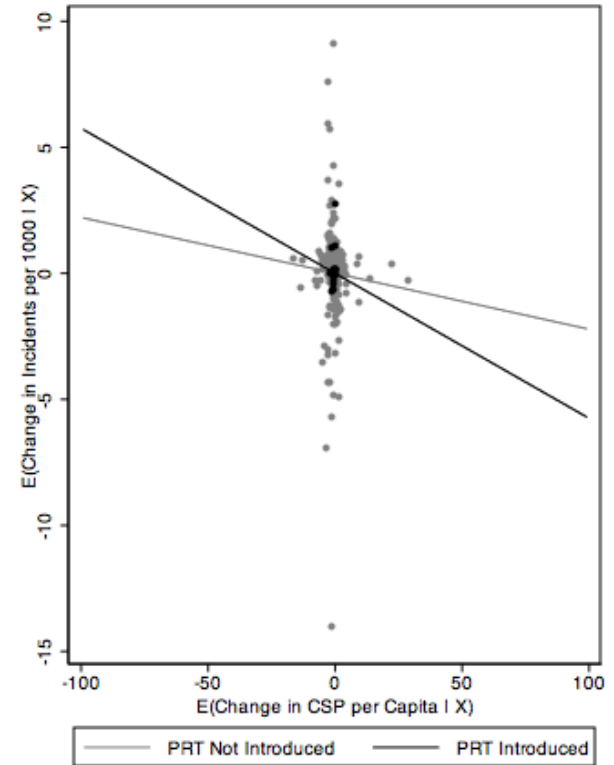
Small CERP Spending



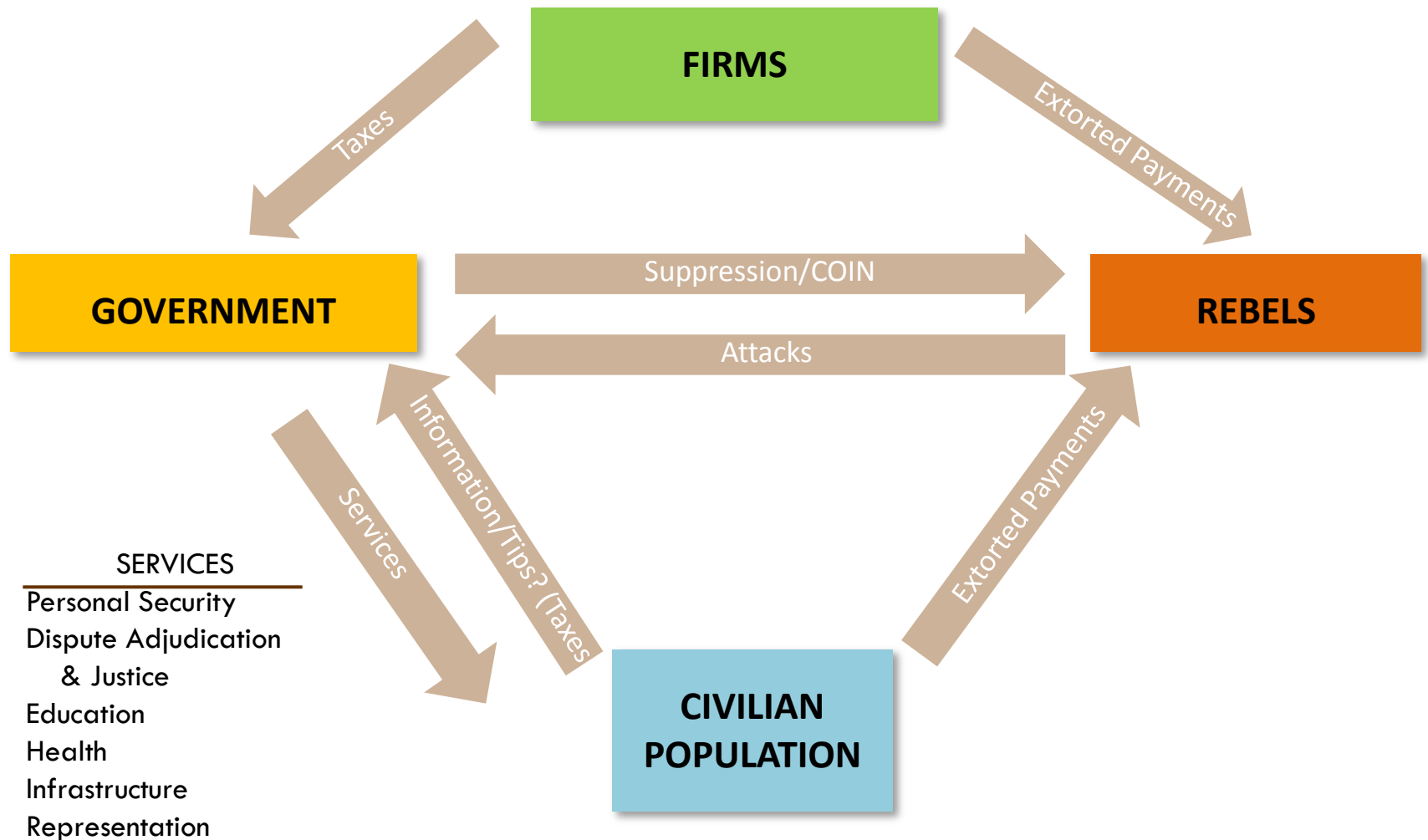
Large CERP Spending



CSP Spending



Adding Investment and Predation: Counterinsurgency as a Four-Sided Contest



Technically,

5 first order conditions determine information sharing, violence, investment, enforcement and public good provision

Existence: Collecting first order conditions for the four players, an equilibrium will be characterized by five equations in five unknowns.

As before, we have a closed form solution for optimal information sharing by C in stage #3

$$(6) \quad i^* = \begin{cases} 0 & \text{if } n \geq g + v + (\theta_R - \theta_G)y \\ 1 & \text{if } n < g + v + (\theta_R - \theta_G)y \end{cases} .$$

In stage #2, we have four equations in four unknowns that determine best response functions $m^*(v, g, I)$ and $g^*(v, m, I)$ for G, $v^*(g, m, I)$ for R in and $I(m, v, g)$ for F, in stage #2:

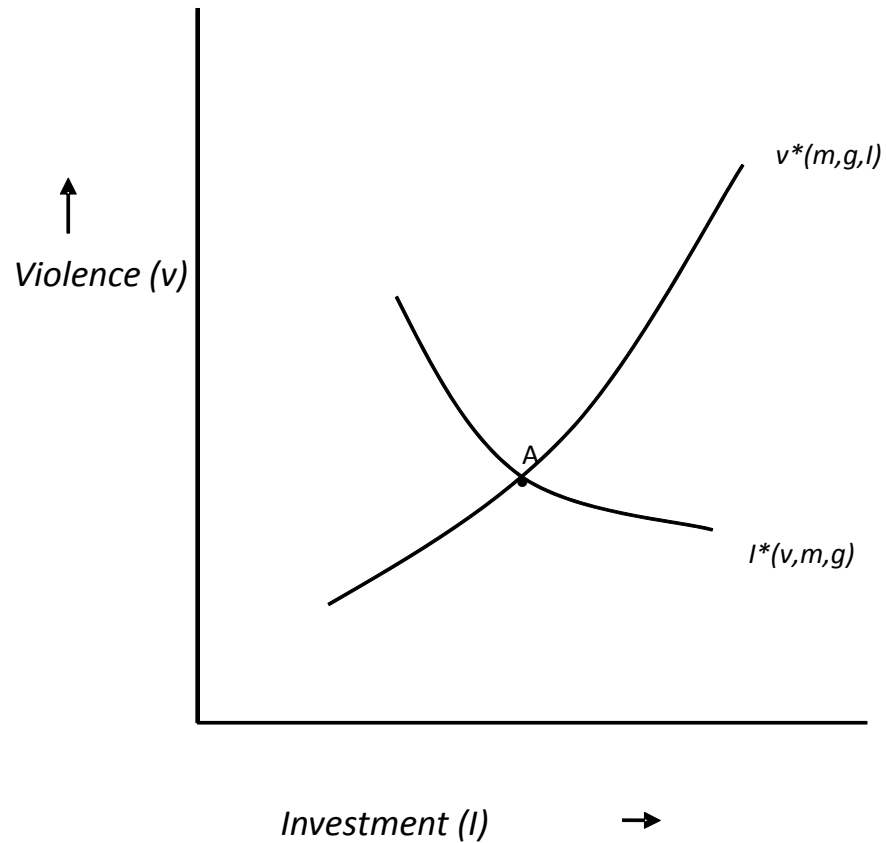
$$(7') \quad 0 = \frac{\partial EC_G}{\partial m} = -[A(v) + \theta_G (y+x)] (g+v+(\theta_R - \theta_G)y-n_L) f h'(m^*) + D'(m^*) ,$$

$$0 = \frac{\partial EC_G}{\partial g} = -[A(v) + \theta_G (y+x)] f h(m) + H'(g^*) ,$$

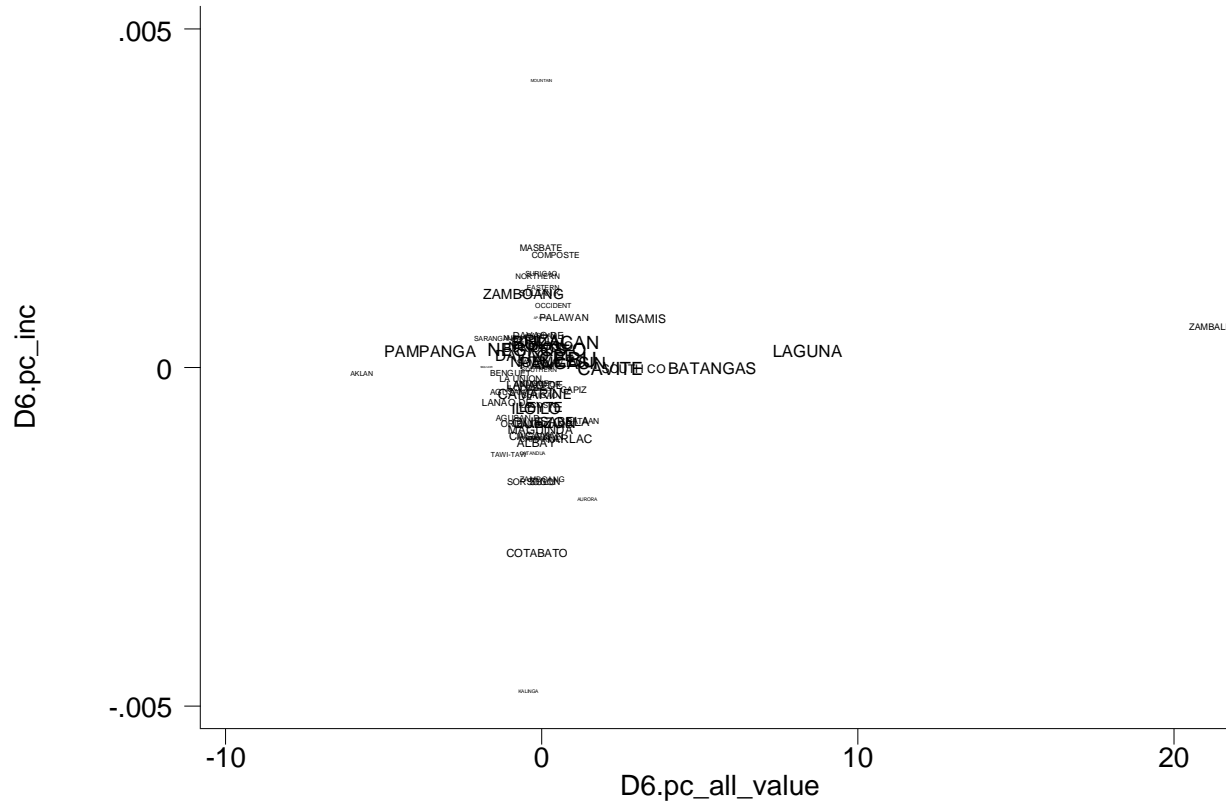
$$0 = \frac{\partial EU_R}{\partial v} = [A'(v^*) + \theta_R'(v^*) (y+x)](1-p^*) - [A(v^*) + \theta_R(v^*) (y+x)] f h(m) - \frac{\partial B(v,y)}{\partial v} , \text{ and}$$

$$(8) \quad 0 = x'(I^*)[(1 - \theta_G)p^* + (1 - \theta_R)(1-p^*)] - 1 .$$

Investment and Violence in Equilibrium



Incidents and Building Permit Value - Long Differences



Philippines: Descriptive Statistics

Building permits proxy for investment, taxes proxy for income

Variable	Mean	Std. Dev.	Min	Max
Incidents / 10K	.6373028	.8980837	0	14.44623
Insurgent initiated	.2300126	.3796753	0	4.839129
Government initiated	.4003411	.5838322	0	9.535932
Fatalities / 10K	.2008023	.3609534	0	4.981457
Government	.0760792	.1558669	0	2.490728
Civilian	.0507195	.0981647	0	1.067455
Insurgent	.0740035	.1703508	0	1.916331
Building permits	.0000161	.000016	0	.000184
Value of permits	.0575042	.1004702	0	1.277501
of which, factories	.0279685	.0746399	0	1.236224
Property taxes	172.8278	390.2825	0	4475.573
Business taxes	140.0631	424.047	0	6657.301

Results: Violence and Building Permits

Left hand side variable:	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
			Insurgent	Govt.				
	Incidents	Incidents	initiated	initiated	Fatalities	Govt. fatalities	Civilian fatalities	Insurgent fatalities
Value of building	-1.973***	0.386**	0.144	0.231**	0.270**	0.140***	-0.00719	0.137*
Permits	(0.593)	(0.191)	(0.130)	(0.113)	(0.124)	(0.0499)	(0.0463)	(0.0797)
Constant	0.640***	0.548***	0.234***	0.314***	0.240***	0.0787***	0.0514***	0.110***
	(0.0996)	(0.0557)	(0.0211)	(0.0429)	(0.0220)	(0.00840)	(0.00559)	(0.0154)
Province		x	x	x	x	x	x	x
Indicators								
Observations	553	553	553	553	553	553	553	553
R-squared	0.064	0.676	0.708	0.597	0.667	0.655	0.440	0.531

All specifications include a complete set of year indicators. Robust standard errors in parentheses, clustered on province. *** p<0.01, ** p<0.05, * p<0.1

Other Philippine Results

- Crost, Felter, Johnston (2012a)
- Means-tested community-driven development projects in Philippine periphery
- *Increases* in violence among recipients (in contrast to comparisons) on announcement
- “Aid Under Fire...”
- Crost, Felter, Johnston (2012b)
- Conditional cash transfers in Philippine periphery
- Preliminary results indicate small *decreases* in violence among recipients

Afghanistan, Iraq, Philippines

- Billions spent on development projects in Afghanistan
- Observational evaluations yield statistical zeroes
- (Not circulating)
- Increases in employment are associated with *increases* in violence in Afghanistan, Iraq and Philippines
- In district / year panels over multiple years
- Consistent with predation, though other explanations possible
- Berman, Shapiro, Felter, Callen (2011)

Do Development Programs Reduce Conflict?



What do we know about mechanism B?

- We lack evidence on what flavors of aid and development programs best reduce conflict, if at all, and under what conditions
- Mixed evidence on income and violence (Miguel & Blattman)
- **Theoretically it's unclear:**
 - *Predation*: Development may produce more to fight over (or provide more resources for rebels and to capture even without a fight) (Collier, Fearon)
 - *Hearts & Minds*: Development may a. reduce grievances, or b. increase opportunity cost of rebelling, or c. induce noncombattants to provide government with tips (intelligence) (Mao, U.S. Army)
 - *Hobbes*: Development may increase tax revenues available to spend on suppressing rebels (Fearon & Laitin)

Conclusions

- **How to best design development in conflict zones?**
 - **Modest, Informed, Secure (Non-extortable) and Conditional appear to be *sufficient* conditions**
(evidence mixed on complementarity of troops with large CERP)
 - ***Necessary* conditions under investigation**
- **Extends to “*small-footprint*” stabilization interventions: e.g. Philippines, Libya, Syria?**
 - **Same criteria for *spaces without active insurgencies* (e.g., Mexico) ?**
Should they apply to any environment in which criminal or corrupt organizations are capturing rents through extortion, and/or providing alternative services to government?
 - **Can *governance improvement* interventions reduce the ability of insurgents and criminal organizations to operate?**
- **Governance improvement should eventually influence attitudes against insurgent violence, shifting stability curve to lower levels.**

Clubs or “Hearts and Minds”?

- **The two models share defection or snitching (cooperation with authorities)**
- **In the club model a combatant defects, while in the rational peasant model a noncombatant snitches**
- **Who cares which model is relevant?**
 - **predicting tactic choice by rebels:**
 - **conventional tactics are cheaper, but share information with noncombatants (ambush, IED) while modern (club) tactics do not (suicide attack)**
 - **most organizations are not capable of club tactics because of defection constraints**
 - **targeting of police efforts**
 - **only club model relevant for domestic terrorism**

7. Resources & Data: DACOR & ENSA

New research,
summaries of literature,
conference proceedings,
and other interesting stuff
are here:

igcc.ucsd.edu/DACOR

Economics of National
Security Association

ensa.us.com



Home > Research > Terrorism, Conflict, and Development

Research

- Terrorism, Conflict, and Development
 - Conferences/Workshops
 - USAD Evidence Summit
- Technology, Innovation, Security
- Environment and Health
- Regional Diplomacy
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Development and Conflict Research (DACOR)

Project Background

In efforts to undermine the support base for violent and extremist groups, the U.S. government often relies on a standard set of policy interventions: a) the provision of security assistance to governments; b) efforts to encourage more inclusive governance (by encouraging decentralization or democratization); and c) welfare-enhancing development programs (e.g., education, agriculture, public works, and health). While the logic underlying each of these interventions is sound, recent research on terrorist and insurgent groups suggests such policies can be counterproductive or, at a minimum, are effective only under certain conditions.

IGCC Research Director Eli Berman and his partners at Princeton, Stanford, Yale, and UC Berkeley have undertaken a broad program of activities, carrying out theoretical, empirical and field research on terrorism, governance, and development in key locations around the world: Afghanistan, Pakistan, Iraq, Northern Ireland, the Philippines and Brazil. The project focuses on developing an integrated theory of counterinsurgency and counterterrorism by collecting and testing new data on political violence by violent extremist groups, religious and secular. This integrated theory could ultimately be used by U.S. policymakers as they allocate resources to both benign and coercive methods to counter political violence in conflicts around the world.

Members of the team have developed and tested highly influential theories that can form the building blocks of an integrated theory of political violence, governance, and development. This comprehensive, empirically-driven research program will extend and test those theories, using new data derived from field work and experiments conducted at a range of locations around the world.

This research program is training and supporting graduate students and young researchers in the rapidly growing research fields of political and economic development in conflict and post-conflict environments. Postdoctoral scholars for the 2010–2011 academic year are Lindsay Heger and Luke Condra.

Activities

2011

Governance, Development, and Political Violence Workshop

2009

Governance, Development, and Political Violence Workshop

Publications and Papers

Eli Berman, Jacob N. Shapiro and Joseph H. Felter, Can Hearts and Minds Be Bought? *The Economics of Counterinsurgency in Iraq*, *Journal of Political Economy* Vol. 119, No. 4 (August 2011), pp. 766-819

Related Reading

Readings from the 2010 USAID Evidence Summit

Empirical Studies of Conflict (ESOC)

esoc.princeton.edu

- ❑ **Countries:** Iraq, Afghanistan, Vietnam, the Philippines, Colombia, Northern Ireland, Northern Caucasus, the Occupied Territories, Pakistan, Uganda, (Egypt).
- ❑ **Institutions:** UCSD, Stanford, Princeton, Yale, LSE, UT Austin, Berkeley.
- ❑ **Funding and cooperation:** DoD/OSD, NSF, DHS, USAID, IGC, IGCC, World Bank, Government Departments in Philippines, Colombia.



Rational Choice Matters

- **Can this fit in a rational choice model?**
 - **is that model helpful in predicting behavior?**
- **Policy implication:**
 - **can the shift to militia activity be reversed?**
 - **does behavior respond to incentives?**
 - **what could we recommend if it did not?**