UNSECURED BONDS: THE AS EFFECTIVE AND MOST EFFICIENT PRETRIAL RELEASE OPTION

PRETRIAL JUSTICE INSTITUTE

Michael R. Jones
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The Pretrial Justice Institute is a non-profit organization dedicated to advancing safe, fair, and effective pretrial justice practices and policies. For more information, visit www.pretrial.org.

STUDY SUMMARY

This study was done to provide judicial officers, prosecutors, defense attorneys, sheriffs, jail administrators, county commissioners, pretrial services program directors, and other decision-makers in Colorado as well as in other states empirical evidence that can directly inform their pretrial release and detention policies and practices. Specifically, the simultaneous influence of unsecured bonds (personal recognizance bonds with a monetary amount set) and of secured bonds (surety and cash bonds) on the three most important pretrial outcomes: (1) public safety; (2) court appearance; and (3) jail bed use, were compared. The study, using data from over 1,900 defendants from 10 Colorado counties, found the following:

For defendants who were lower, moderate, or higher risk:

- Unsecured bonds are as effective at achieving public safety as are secured bonds.
- Unsecured bonds are as effective at achieving court appearance as are secured bonds.
- Unsecured bonds free up more jail beds than do secured bonds because: (a) more defendants with unsecured bonds post their bonds; and (b) defendants with unsecured bonds have faster release-from-jail times.
- Higher monetary amounts of secured bonds are associated with more pretrial jail bed use but not increased court appearance rates.
- Unsecured bonds are as effective at "fugitive-return" for defendants who have failed to appear as are secured bonds.
- Many defendants are incarcerated for the pretrial duration of their case and then released to the community upon case disposition.
- Jurisdictions can make data-guided changes to local pretrial case processing that would achieve their desired public safety and court appearance results while reserving more jail beds for unmanageably high risk defendants and sentenced offenders.
- Judicial officers now have data and law to support changing their bail setting practices to maintain their effectiveness while increasing their efficiency.

This study provides empirical evidence about the effectiveness of secured and unsecured bonds. Findings support judicial officers changing their practices to use more unsecured releases, to include unsecured bonds if currently permitted by law, to achieve the same public safety and court appearance rates while using far fewer jail beds. These unsecured bonds could be used in conjunction with an individualized bond setting hearing.

INTRODUCTION

Multiple criminal justice and government decision-makers have a role in the decision to release or detain defendants on pretrial status, either at the policy level or on a case-by case basis. Jail administrators are commonly granted authority by the court to release many defendants on their own recognizance or through the use of a money bond schedule, and those administrators are responsible for housing defendants who are not released. Pretrial services staff members perform risk assessment and information gathering, and provide the results and any release-condition recommendations to the court. Prosecutors and defense attorneys at pretrial hearings often request certain release conditions, including substance testing, electronic monitoring, or changes to a previously set monetary bond amount, based on their perception of the defendant's pretrial risk to court appearance or public safety. Judges make the final decisions about the types of bond and conditions of bond, including financial and non-financial release conditions. County commissioners or state legislators fund the staff and court and jail facilities that comprise the pretrial system and/or pass laws, but often do so with little or no evaluative feedback about the system's effectiveness or efficiency.

Whether in the role of making daily, case-by-case pretrial release or detention decisions or policy-level funding decisions, many of these criminal justice decision-makers have had to do so without scientific evidence to help guide their decisions. As a result, they may assume that the current pretrial justice process meets their standards for effectiveness and efficiency, and that the money bail system motivates defendants to return to court or to refrain from criminal activity upon release from jail pending the disposition of their case.

Researchers have recently attempted to determine to what extent, if any, secured monetary forms of pretrial release (e.g., surety or cash bonds) improve court appearance and public safety over non-monetary or unsecured forms of pretrial release (e.g., recognizance bonds). Unfortunately, for the reasons that Cohen and Kyckelhahn (2010) and Bechtel, Clark, Jones, and Levin (2012) have recently explained, researchers have not had access to data that has allowed them to determine simultaneously the effect of different bond types on the three most important pretrial outcomes: (1) public safety; (2) court appearance; and (3) pretrial release and jail bed use. To summarize, previous research has either: (a) had data or methodological limitations that limit the generalizability of the findings to other jurisdictions (see, for example, Morris, 2013; Krahl & New Direction Strategies, 2011); (b) has not sufficiently accounted for possible alternate explanations of the findings (see, for example, Block, 2005); and/or (c) was limited to measuring the effect of various forms of pretrial release on a singular outcome - court appearance, but not on both of the other two important pretrial outcomes - public safety and jail bed use (see, for example, Helland & Tabarrok, 2004; Morris, 2013). Indeed, as Bechtel et al. (2012) explain, the optimal outcome for any pretrial justice system from both an effectiveness (justice system goals) and efficiency (resource management) perspective is to:

(1) Maximize public safety
and
(2) Maximize court appearance
while
(3) Maximizing release from custody.

Achieving only one or two of these pretrial outcomes without or at the expense of realizing the remain-

der would be less optimal than achieving all three simultaneously. Indeed, Osborne and Hutchinson (2004) make a compelling case for governments to maximize results while expending the minimal public resources to achieve those results.

The purpose of this study is to overcome some of the limitations of previous research and provide information to pretrial release decision-makers and criminal justice funding decision-makers that will enable them to accomplish a win-win situation: to achieve their desired public safety and court appearance outcomes while most efficiently using their costly jail resources. Because the study uses data from multiple Colorado counties, the results are generalizable throughout Colorado. Factors that may affect the extent to which the results are generalizable outside of Colorado are addressed later in the paper.

Furthermore, due to Colorado statute's requirement of financial conditions of release, this study is an evaluation of the effect of different types of monetary bonds on public safety, court appearance, and jail bed use. As described in more detail later, some of these monetary bonds in Colorado require the defendant to post the entire monetary amount in cash or some portion thereof through a commercial bail bondsman prior to leaving jail custody, whereas other monetary bonds do not require any money to be posted prior to release.[1]

After each statistical analysis, a brief explanation of the meaning of the findings is provided. Practical implications of this study for pretrial release decision-making and policy-making are discussed in the final section.

1 This study does not evaluate the effectiveness of commercial bail bonding in achieving court appearance results, nor does it evaluate the effectiveness of pretrial services program supervision in achieving certain court appearance or public safety results. Rather, the focus is on outcomes associated with various forms of monetary bonds set by the court.

METHOD

Data for this study came from the dataset used to develop Colorado's 12-item empirically-derived pretrial risk assessment instrument, the Colorado Pretrial Assessment Tool (CPAT; Pretrial Justice Institute & JFA Institute, 2012). The dataset has hundreds of case processing and outcome variables collected on 1,970 defendants booked into 10 Colorado county jails over a 16-month period.[2] Each local jurisdiction collected data on a pre-determined, "systematic random sampling" selection schedule to minimize bias in selecting defendants and to enhance the generalizability of the findings. For example, each jurisdiction collected data at an interval of every 2nd, 4th, or 7th defendant who was booked into the jail on new charges. Over 80% of the state's population resides in the 10 counties that participated: Adams, Arapahoe, Boulder, Denver, Douglas, El Paso, Jefferson, Larimer, Mesa, and Weld.

DEFENDANTS WERE ASSESSED FOR THEIR PRETRIAL RISK, AND NEARLY 70% SCORED IN THE LOWER TWO OF FOUR RISK CATEGORIES.

Based on the CPAT's scoring procedures, 1,970 defendants in the dataset were assigned a CPAT risk score, ranging from 0 (lower risk) to 82 (higher risk), and to a corresponding risk category, ranging from 1 (lower risk) to 4 (higher risk). Some relevant data were missing for 51 defendants, so they were removed from all analyses. Thus, the final sample used in the analyses was 1,919 defendants, with 1,309 (68%) of them having been released on pretrial status prior to case disposition. Table 1 shows the percentage of released defendants and the public safety and court appearance success rates associated with each risk category.

Table 1. Average Risk Score, Percent and Number of Defendants, and Public Safety and Court Appearance Rates by Released Defendants' Risk Category

CPAT PRETRIAL RISK CATEGORY	CPAT RISK SCORE RANGE	AVERAGE CPAT RISK SCORE	PERCENT (AND NUMBER) OF DEFENDANTS	PUBLIC SAFETY RATE[a]	COURT APPEARANCE RATE[b]
1 (lower)	0 to 17	8	20% (265)	92% (243/265)	95% (252/265)
2	18 to 37	28	49% (642)	81% (517/642)	86% (549/642)
3	38 to 50	44	23% (295)	70% (205/295)	78% (231/295)
4 (higher)	51 to 82	57	8% (107)	59% (63/107)	51% (55/107)
Average/Total	0 to 82	30	100% (1,309)	79% (1,028/1,309)	83% (1,087/1,309)

a. On the CPAT and for this study, the public safety rate is defined as the percentage of defendants who did not have a prosecutorial filing in court for any new felony, misdemeanor, traffic, municipal, or petty offense that allegedly occurred during the pretrial release time period. Thus, public safety is defined very broadly as any new filing and is not limited to physical harm against a person or to felony or misdemeanor charges.
b. The court appearance rate is defined as the percentage of defendants who attended all of their court hearings during their pretrial release (i.e., they did not have any notations of failure to appear indicated in the Colorado Judicial Branch's statewide database).

2 Risk assessment data were collected over the 16-month period from February 2008 to May 2009, and pretrial outcome data were collected after cases closed up until December 2010, thus allowing at least 19 months for all cases to close after defendants were booked into jail because of new charges. Ninety-nine percent (99%) of the cases closed within the minimum 19-month time period.

Summary of Findings

The CPAT effectively sorts defendants into one of four risk categories, with each category having different rates for the desired outcomes of public safety and court appearance. Nearly 70% of defendants scored in the lower two risk categories. These risk categories can be used when examining the impact of different forms of money bonds on public safety, court appearance, and jail bed use.

DEFENDANTS RECEIVED EITHER UNSECURED OR SECURED BONDS, AND WERE SEPARATED INTO FOUR GROUPS TO ENABLE ANALYSIS OF BOND-TYPE COMPARISONS.

Table 2 shows the percentage of released defendants who received unsecured or secured (surety or cash) money bonds within each of the four risk categories. Statutorily, all bonds in Colorado must have a financial condition.[3]

Table 2: Percent and Number of Released Defendants by Bond Type and Risk Category

PRETRIAL RISK CATEGORY	BOND TYPE	
	UNSECURED[a]	SECURED[b]
1 (lower)	52% (137/265)	48% (128/265)
2	32% (208/642)	68% (434/642)
3	15% (45/295)	85% (250/295)
4 (higher)	13% (14/107)	87% (93/107)
Average	31% (404/1,309)	69% (905/1,309)

a. Unsecured bonds do not require defendants to post money prior to their pretrial release from jail. While Colorado law uses the term "personal recognizance," the term "unsecured" is used in this paper to distinguish these bonds from "pure" personal recognizance bonds (or "own recognizance" bonds), as they are called in many other states. Financial conditions are rarely allowed or used with "pure" or "own" recognizance bonds.
b. Secured bonds require defendants to post some amount of money prior to their pretrial release from jail.[4]

3 Unsecured bonds in Colorado are known in statute as personal recognizance bonds and although they are required to have a financial condition in some monetary amount, they do not require the defendant to post any money with the court prior to pretrial release from jail. If the defendant fails to appear, the court can hold the defendant liable for the full amount of the bond. The court can also require the signature of a co-signor on unsecured bonds prior to the defendant's release from jail. The co-signor is typically a family member who promises the court that he or she will assist the defendant in appearing in court and who may be held liable for the full monetary amount if the defendant fails to appear. In this study, as noted above, these personal recognizance bonds are called "unsecured" bonds because they have a financial condition for which the defendant or co-signor could be fully liable. The unsecured bond group is for the most part a "defendant-only (with no co-signor) unsecured" group because 344 (85%) of the 404 unsecured bonds did not require a co-signor.

4 Secured bonds in Colorado require money to be posted with the court on the defendant's behalf prior to pretrial release, and can be in the form of cash, surety, or property. If the defendant fails to appear, the court can hold the defendant or a commercial bail bondsman (for a surety bond) liable for the full amount of the bond. The secured bond group is for the most part a "surety bond" group because 849 (94%) of the 905 secured bond defendants posted a surety bond rather than a cash bond. Surety bonds were the most prevalent form of bond set by the court during the time this study's data were collected. Property bonds are very rarely used in Colorado, and were not used for any of the defendants in this study.

Summary of Findings

Data show that judicial officers set both unsecured and secured bonds for defendants in each of the four risk groups. All of these bonds carry the possibility that the court could hold the defendant or other party (i.e., co-signor or bail bondsman) legally liable for the bond's full monetary amount if the defendant fails to appear in court. For surety bonds, defendants are still liable for the full monetary amount, albeit indirectly. If a defendant released on surety bond fails to appear, the court, within the confines of statute, may hold the bail bondsman liable for the full monetary amount. If so, then the bail bondsman may offset this expense by collecting the full monetary amount of the bond pursuant to the contract with the defendant or the defendant's family member or friend, and turn over the full bond amount to the court.

Placing defendants into one of four risk categories stratifies defendants based on their overall level of risk, thus helping increase the chances that defendants' bond type, rather than their degree of pretrial risk, accounts for the observed results. Specifically, the stratification was done because in the total sample there was a relatively higher proportion of lower risk defendants in the unsecured bond group and a relatively higher proportion of higher risk defendants in the secured bond group. This pattern of data is found across most criminal justice systems nationwide. In addition, the total sample size of defendants in this study and in the four separate risk groups is large enough to detect statistical differences between the two bond-type groups if differences indeed do exist (see Cohen, 1988).[5]

Moreover, the Colorado jurisdictions that have already implemented the CPAT or that will be implementing it in the near future use the CPAT's four-category risk scheme to guide daily pretrial release and detention decision-making, so using the CPAT's risk scheme in this study enables the study to provide decision-makers with findings that directly inform their daily practice.

5 The social science conventional standard of 0.05 for statistical significance testing was used throughout this study. Statistical significance at the 0.05 level means that we can be at least 95% confident that the observed results are not due to chance. To statistically determine that defendants with unsecured bonds were similar in pretrial risk to defendants with secured bonds, stratification, or the separation of the defendants into incremental groups, was done. Separate t-tests (tests used to determine if two groups have different averages on a measure) were performed on the four pretrial risk groups. These analyses showed that the average risk score for defendants with unsecured bonds was not statistically significantly different than the average risk score for defendants with secured bonds in risk categories 1, 3, and 4 (all $p > 0.19$). For risk category 2, the average score for defendants with unsecured bonds (27) was two points less than the average score for defendants with secured bonds (29) ($p < .001$). However, given that there was no significant difference for the other three risk categories, including the categories both below (i.e., category 1) and above (i.e., categories 3 and 4) category 2, and because the two-point score difference was no larger than the non-significant score difference in the other three risk categories, the statistically significant difference observed in category 2 is determined not to be practically significant. That is, the difference is likely not meaningful enough to be useful for purposes of informing practice. Additionally, there were no significant differences in the percentages of defendants who were ordered to pretrial supervision among the four risk groups (ranging from 48% to 50% for each of the four groups), indicating that pretrial supervision likely did not interfere with the effects of bond type on the outcome measures.

GOALS OF THE STUDY

This study evaluates the extent to which, if at all, one type of money bond (unsecured) is associated with better pretrial outcomes than is the other type of money bond (secured, in the form of cash or surety) while also accounting for jail bed use. Because all bonds in Colorado have a monetary condition, this study was not able to test whether bonds with no financial condition could have achieved the same public safety or court appearance outcomes as did bonds with a financial condition.

For the following analyses, defendants were sorted into two groups depending on the type of money bond they received – unsecured or secured. Defendants' performance on the three pretrial outcomes most important to pretrial decision-makers - public safety, court appearance, and jail bed use - was examined. Defendants in the two bond-type groups were compared separately within each of the four pretrial risk categories to mitigate the influence of defendants' risk levels on the observed outcomes.

RESULTS

UNSECURED BONDS ARE AS EFFECTIVE AS SECURED BONDS AT ACHIEVING PUBLIC SAFETY.

Table 3 shows the percentage of defendants who were not charged with a new crime during pretrial release (i.e., the public safety rate) for the unsecured and secured bond groups in each of the four risk categories.

Table 3: Public Safety Outcomes by Bond Type and Risk Category

PRETRIAL RISK CATEGORY	PUBLIC SAFETY RATE	
	UNSECURED BOND	SECURED BOND
1 (lower)+	93% (128/137)	90% (115/128)
2+	84% (174/208)	79% (343/434)
3+	69% (31/45)	70% (174/250)
4 (higher)+	64% (9/14)*	58% (54/93)
Average**	85% (342/404)	76% (686/905)

+ All statistical comparisons showed no statistically significant differences. All $p > 0.16$.
* The 64% observed in this cell is based on a small sample size (n=14) and thus should be interpreted with caution. For example, if one more defendant in the unsecured bond group had no new charges, the percentage would increase to 71%. If one more of these defendants had a new charge, the percentage would decrease to 57%.
** The public safety rate for all unsecured bond defendants was not compared to the rate for all secured bond defendants because that analysis would fail to control for defendants' degree of pretrial risk.

Chi-square tests[6] revealed that there were no statistically significant differences in defendants' public safety outcomes for the two different types of bond in each of the four risk categories. This finding also holds when only person crimes are analyzed. That is, defendants from both bond-type groups did not significantly differ from one another in their rate of receiving new charges for alleged crimes against a person while on pretrial release ($p > 0.65$).

Summary of Findings

Whether released defendants are higher or lower risk or in-between, unsecured bonds offer the same public safety benefit as do secured bonds. This finding is expected because although defendants can have their bond revoked if they receive a new charge while on pretrial release, they legally cannot be ordered to forfeit any amount of money or property under any bond type. Thus, the financial condition of an unsecured or secured bond cannot legally have an impact on defendants' criminal behavior. This study's failure to find a public safety benefit for one bond type over another is consistent with previous research (Helland & Tabarrok, 2004; Morris, 2013).

6 The Chi-square statistic tests the degree of agreement between observed data and the data expected under a certain hypothesis. It can be used to compare the differences in frequencies on a measure between two groups.

UNSECURED BONDS ARE AS EFFECTIVE AS SECURED BONDS AT ACHIEVING COURT APPEARANCE.

Table 4 shows the percentage of defendants who made all of their court appearances during pretrial release (i.e., the court appearance rate) for the unsecured and secured bond groups in each of the four risk categories.

Table 4: Court Appearance Outcomes by Bond Type and Risk Category

PRETRIAL RISK CATEGORY	COURT APPEARANCE RATE	
	UNSECURED BOND	SECURED BOND
1 (lower)[+]	97% (133/137)	93% (119/128)
2[+]	87% (181/208)	85% (368/434)
3[+]	80% (36/45)	78% (195/250)
4 (higher)[+]	43% (6/14)*	53% (49/93)
Average**	88% (356/404)	81% (731/905)

[+] All statistical comparisons showed no statistically significant differences. All $p > 0.12$.

* The 43% observed in this cell is based on a small sample size (n=14) and thus should be interpreted with caution. For example, if one more defendant in the unsecured bond group made all court appearances, the percentage would increase to 50%. If one more of these defendants had a failure to appear, the percentage would decrease to 36%.

** The court appearance rate for all unsecured bond defendants was not compared to the rate for all secured bond defendants because that analysis would fail to control for defendants' risk.

Chi-square tests revealed that there were no statistically significant differences in defendants' court appearance outcomes for the two different types of bond in each of the four risk categories.

Summary of Findings

Whether released defendants are higher or lower risk or in-between, unsecured bonds offer decision-makers the same likelihood of court appearance as do secured bonds. The lack of benefit from using one financial bond type versus another is not surprising given that both bond types carry the potential for the defendant to lose money for failing to appear.

UNSECURED BONDS FREE UP MORE JAIL BEDS THAN DO SECURED BONDS BECAUSE MORE DEFENDANTS WITH UNSECURED BONDS POST THEIR BONDS.

Table 5 shows the percentage of defendants who were released from jail on pretrial status for the unsecured and secured bond groups in each of the four risk categories.[7]

Table 5: Pretrial Release Rates by Bond Type and Risk Category

PRETRIAL RISK CATEGORY	RELEASE RATE+	
	UNSECURED BOND	SECURED BOND
1 (lower)+	93% (137/147)	83% (128/155)
2+	95% (208/220)	65% (434/669)
3+	96% (45/47)	54% (250/464)
4 (higher)+	88% (14/16)*	46% (93/201)
Average**	94% (404/430)	61% (905/1,489)

+ All statistical comparisons were statistically significant. All $p < 0.006$.

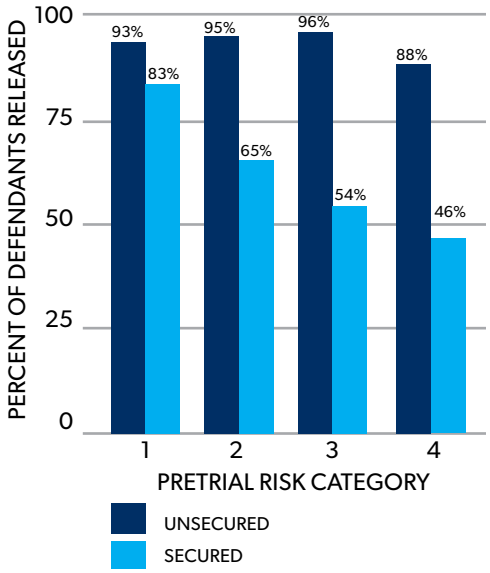
* The 88% observed in this cell is based on a small sample size (n=16) and thus should be interpreted with caution. For example, if one more defendant in the unsecured bond group were released, the percentage would increase to 94%. If one more of these defendants were not released, the percentage would decrease to 81%.

** The release rate for all unsecured bond defendants was not compared to the rate for all secured bond defendants because that analysis would fail to control for defendants' risk.

Chi-square tests revealed that the release rates for unsecured bond defendants were statistically significantly higher than the release rates for secured bond defendants for all four of the pretrial risk categories.

The findings shown in Table 5 are illustrated in Figure 1.

Figure 1: Pretrial Release Rates by Bond Type and Risk Category



7 The number of defendants who post their bonds and the time to post those bonds, as opposed to the number of defendants released on pretrial status and their time to release, are better measures for more accurately determining pretrial jail bed use because once a bond is posted, the defendant is no longer utilizing a jail bed for pretrial reasons. The defendant may or may not remain in jail after bond-posting because of other cases or holds. However, for this study, like in most pretrial research, data on dates that bonds were posted were not available, so the next best measures for determining pretrial jail bed use - release on pretrial status and time to pretrial release - were used.

Both Table 5 and Figure 1 show that judicial officers used both unsecured and secured bonds with defendants of all risk levels - higher risk, lower risk, and those in between. For defendants at all risk levels, defendants with an unsecured bond were statistically significantly more likely to be released than defendants with a secured bond.[8]

Summary of Findings

Whether released defendants are higher or lower risk or in-between, unsecured bonds enable more defendants to be released from jail than do secured bonds. Findings show that many defendants of all risk levels never post their secured bond. This finding is expected because defendants who receive unsecured bonds, or their family or friends, do not have to pay some monetary amount to the court or a commercial bail bondsman prior to the defendants' release from jail custody. Secured bonds, however, do require pre-release payment. Consequently, secured bonds used more jail beds. This finding is consistent with previous research using data from across the United States that shows that secured bond defendants are much more likely to be detained for their entire pretrial period than are unsecured bond defendants (Cohen & Reaves, 2007).

THE MONETARY AMOUNT OF SECURED BONDS AFFECTED PRETRIAL RELEASE RATES BUT NOT COURT APPEARANCE RATES.

Table 6 shows the percentage of defendants who were released from jail on secured bonds of select monetary amounts.

Table 6: Pretrial Release Rates by Secured Bond Amount

SECURED MONETARY BOND AMOUNT	PERCENT (AND NUMBER) OF RELEASED DEFENDANTS
$500 (12th Percentile)	64% (52/81)
$5,000 (65th Percentile)	58% (100/191)
$50,000 (97th Percentile)	49% (37/76)

Frequency analyses revealed that when the secured bond amount was set relatively very low at $500 (12th percentile of secured bond amounts set by Colorado judicial officers in this study), 64% of defendants were released. When the secured bond amount was set at $5,000 (65th percentile of secured bond amounts), 58% of defendants were released. When the secured bond amount was set at $50,000 (97th percentile of secured bond amounts), 49% of defendants were released. However, correlational analyses revealed that the monetary amount of posted secured bonds was not statistically significantly related to court appearance for any of the four risk groups ($p > 0.09$).

8 It is possible that the lower release rate for secured bond defendants could have been in part associated with judicial officers having accounted for an unmeasured risk factor in these defendants, and thus the public safety and court appearance rates would have been lower for these defendants had they been released. The mechanism for achieving this increase in pretrial detention would have been judicial officers setting secured bonds in a monetary amount the defendant could not post. Several judicial officers have told this author that this practice is not uncommon in Colorado, but have acknowledged its questionable lawfulness given Colorado's constitutional and statutory law. Nonetheless, as indicated by this study's analyses, if more secured bond defendants had been released, the secured bonds would likely not have associated with increased public safety or court appearance.

Summary of Findings

As the monetary amount of secured bonds increases, fewer defendants post their bonds. However, regardless of whether defendants are higher or lower risk or in-between, higher bond amounts are not associated with better court appearance outcomes for released defendants. Thus, higher secured bond amounts are associated with more pretrial incarceration but not more court appearances. The finding of increased incarceration associated with secured bonds is consistent with previous research using data from across the United States: As the monetary amount of secured bonds increases, the probability of release decreases (Cohen & Reaves, 2007).

UNSECURED BONDS ALSO FREE UP MORE JAIL BEDS THAN DO SECURED BONDS BECAUSE DEFENDANTS WITH UNSECURED BONDS HAVE FASTER RELEASE TIMES.

Table 7 shows the cumulative percent of defendants who were released on pretrial status for the unsecured and secured bond groups by the amount of time in jail that elapsed prior to pretrial release.

Table 7: Time to Pretrial Release by Bond Type

DAYS TO PRETRIAL RELEASE*	CUMULATIVE PERCENT OF DEFENDANTS RELEASED ON UNSECURED BONDS	CUMULATIVE PERCENT OF DEFENDANTS RELEASED ON SECURED BONDS
<1 to 1.9⁺	80% (325/404)	58% (525/905)
2 to 2.9⁺	83% (336/404)	68% (611/905)
3 to 3.9⁺	85% (344/404)	73% (663/905)
4 to 4.9⁺	86% (348/404)	77% (699/905)
5 to 5.9⁺	87% (351/404)	80% (721/905)
6 to 6.9⁺	88% (356/404)	81% (731/905)
7 to 7.9⁺	88% (356/404)	82% (741/905)
8 to 8.9⁺	89% (358/404)	84% (758/905)
9 to 9.9⁺	89% (360/404)	85% (768/905)
10 to 10.9**	89% (360/404)	86% (774/905)
11 to 11.9**	89% (361/404)	86% (781/905)
12 to 12.9**	90% (362/404)	87% (784/905)

⁺ All statistical comparisons were statistically significant. All $p < 0.05$.

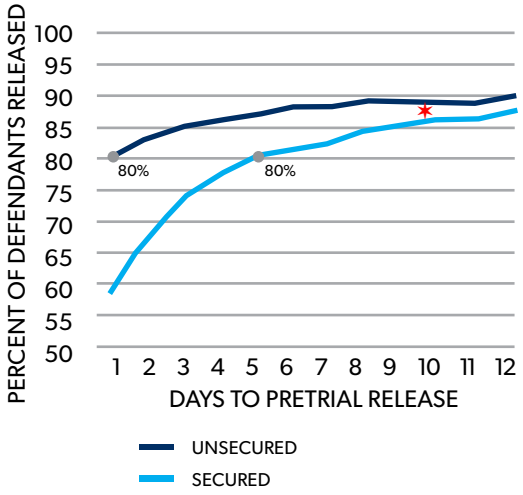
* Defendants across all risk categories were grouped together for this analysis because a defendant's pretrial risk level can have no legal bearing on the amount of time a defendant remains in pretrial incarceration after a judicial officer sets the bond. In contrast, the monetary amount of a secured bond, holds from other jurisdictions, or requirements from a defendant's other cases can affect whether and when the defendant can be released from jail even if the defendant has posted his bond, regardless of bond type and regardless of his pretrial risk level.

** Beginning on the tenth day of pretrial incarceration, the percent of defendants in the two bond type groups who had not been released on pretrial status was no longer statistically significantly different ($p > 0.07$). Because there was no significant difference after day 9, it was assumed for the purposes of this analysis that after day 9 other factors, such as the defendants' other cases or possible holds, contributed to defendants' continued pretrial incarceration to the degree that the bond type was no longer the primary factor contributing to continued pretrial incarceration. In addition, a t-test revealed that the average time to pretrial release for the unsecured bond group (0.7 days) was statistically significantly lower than that for the secured bond group (1.5 days) when the analysis of pretrial incarceration was capped at 9 days for the reasons described above ($p < 0.0001$). The 9-day cap also makes it likely that the 1.5-day average for the secured bond defendants is an underestimate because 10 or more days may actually elapse before a defendant or his family can meet the court's cash bond or bondsman's surety bond requirements; however, this cap was derived from the best data available for this study. Moreover, the use of this average for the secured bond defendants is still sufficient for statistically demonstrating the increased jail use that results from secured bonds, and is sufficient for demonstrating practical significance for policy-making.

Chi-square tests revealed that statistically significantly more defendants with unsecured bonds were released on pretrial status than were defendants with secured bonds for each of the first nine days after defendants' bonds were set. A t-test revealed that the average number of days spent in jail on pretrial status was statistically significantly less for defendants with unsecured bonds than the average for defendants with secured bonds up to the first nine days after defendants' bonds were set.

The findings shown in Table 7 are illustrated in Figure 2.

Figure 2: Time to Pretrial Release by Bond Type



Note. The ✶ symbol denotes that after day 9, the difference in the percent of released defendants between the two groups was no longer statistically significant. The time at which the 80% threshold was achieved is indicated for both groups.

Figure 2 depicts that released defendants with unsecured bonds spent fewer days incarcerated on pretrial status than did defendants with secured bonds. Moreover, Figure 2 depicts:

- Five days of jail incarceration were required for defendants with cash or surety bonds to achieve the same release threshold of 80% that defendants with unsecured bonds experienced by day one.
- Ten days of jail incarceration were required for defendants with cash or surety bonds to achieve the same overall release threshold as defendants with unsecured bonds because there were statistically significant differences for the first nine days.

Summary of Findings

After judicial officers set defendants' bonds, unsecured bonds enable defendants to be released from jail more quickly than do secured bonds. This finding is expected because nearly all defendants who receive unsecured bonds can be released from custody immediately upon signing their bond, whereas defendants with secured bonds must wait in custody until they or a family member or friend negotiates a payment contract with a commercial bail bondsman or their family member or friend posts the full monetary amount of a cash bond at the jail. This finding indicates that the process of posting a secured bond takes much longer than the process of posting a unsecured bond for released defendants. Furthermore, this finding is consistent with previous research using data from across the United States that shows released defendants with secured bonds remained in jail longer than did released defendants with bonds that did not require a pre-release payment (Cohen & Reaves, 2007).

UNSECURED BONDS ARE AS EFFECTIVE AS SECURED BONDS AT "FUGITIVE-RETURN" FOR DEFENDANTS WHO HAVE FAILED TO APPEAR.

Table 8 shows the percent of defendants whose case was still open up to 19 months after they were released from jail and who were at-large because of a failure to appear warrant, among all released defendants who had failed to appear (i.e., the at-large rate), for the unsecured and secured bond groups.

Table 8: At-Large Rate by Bond Type

AT-LARGE RATE+*	
UNSECURED BOND	SECURED BOND
10% (5/48)	9% (15/174)

+ The comparison was not statistically significantly different ($p > 0.69$). Non-significance was also found when data from just the surety bond defendants were compared to the unsecured bond defendants - that is, when the cash-only bond defendants were removed from the secured bond group ($p > 0.48$).

* There were too few at-large cases in each of the four risk categories to permit analyses within each of the risk categories.

Chi-square tests revealed that there were no statistically significant differences in defendants' at-large rates for the two different types of bond, as well as for surety-bond-only defendants.

Summary of Findings

When released defendants fail to appear, unsecured bonds offer the same probability of fugitive-return as do secured (including surety-only) bonds. Because the commercial bail bond industry often claims that it locates and captures defendants who have failed to appear or who are fugitives on the run (see Professional Bail Agents of the United States, 2013; Tabarrok, 2011), this topic is discussed in detail.

Nationally, the fugitive-return function has received minimal attention in the empirical research literature, and no empirical research prior to the current study has been done in Colorado. This study failed to find support for the commercial bail bond industry's fugitive-return claim for defendants released on surety bonds because there was no difference in the percent of defendants who were released on surety bonds, who failed to appear, and who still had an open case, when compared to the percent of defendants who were released on unsecured bonds, who failed to appear, and who still had an open case. All defendants who had an open case at the time this study's data collection was completed were at-large on a failure to appear warrant and not in jail custody. If commercial bail bondsmen or hired bounty hunters return defendants at a greater rate than the rate for which defendants on unsecured bonds return to custody or court, then the percent of at-large surety bond defendants would be statistically significantly less than it is for unsecured bond defendants. That difference was not found in this study.

This study's failure to find a fugitive-return benefit for one bond type over another is consistent with previous research designed to measure directly the fugitive-return function allegedly associated with surety bonds. Jones, Brooker, and Schnacke (2009) found no empirical support for Colorado commercial bail bondsmen's claim that they locate or apprehend surety bond defendants who had failed to appear, as indicated by local jail booking data, the court's bondsman-contact tracking logs, and by law enforcement officials' report (p. 83).

Furthermore, in 2012 a committee that consisted of several justice system stakeholders and Colorado bail agents' representatives studied Colorado pretrial case processing and decision-making for a year. A portion of that review included discussion about fugitive-return evidence in Colorado.

Committee members acknowledged that there are no data to support the bondsmen's fugitive-return claim, and that the extent to which bondsmen return defendants to jail, court, or to law enforcement officers in Colorado remains empirically undemonstrated.[9]

MANY DEFENDANTS ARE INCARCERATED FOR THE PRETRIAL DURATION OF THEIR CASE AND THEN RELEASED TO THE COMMUNITY UPON CASE DISPOSITION.

Because some judicial officers, sheriffs, and defense attorneys have expressed concern or puzzlement to this author about their observation that apparently many defendants spend the pretrial duration of their case in custody, sometimes for several weeks or months, and then are released to the community upon conviction or sentencing, data on case dispositions were analyzed to determine the extent to which this phenomenon occurs in Colorado.

Table 9 shows the collective percentage of never-released, secured-bond defendants by type of case disposition from all 10 Colorado jurisdictions.

Table 9: Never-Released Defendants by Case Disposition

CASE DISPOSITION	PERCENT (AND NUMBER) OF DEFENDANTS OR OFFENDERS*
Department of Corrections	14% (79)
Jail, Work Release, or Time Served in the Local Jail	34% (194)
Community-Based Option (Diversion, Probation, Community Corrections, Home Detention)	37% (210)
Dismissed or Not Filed	13% (76)
Still Open or Had Some Other Sentence	2% (9)
Total	100% (568)

* Each percentage changes 1% or less when unreleased defendants with recognizance bonds were included in the analysis.

9 See the Colorado Commission on Criminal and Juvenile Justice's Bail Subcommittee's March 2012 Meeting Minutes at http://www.colorado.gov/cs/Satellite/CDPS-CCJJ/CBON/1251617151523.

Summary of Findings

These findings have implications for pretrial jail bed use because 50% (37% + 13%) of defendants return to the community upon conviction or case closure.[10] This percentage increases to 84% (50% + 34%) when defendants who return to the community after completing a jail sentence (including those who received sentences for time served while in pretrial custody) are included. This pattern of findings suggests that when judges and other decision-makers consider the likelihood of a defendant's conviction and the most likely type of sentence, they can further reduce pretrial jail bed use by using more unsecured bonds in lieu of secured bonds for defendants who will likely return to the community upon case disposition (i.e., for those defendants who are not likely to be transported to the Department of Corrections to start a sentence).

10 With the exception of some defendants for whom another case results in continued detention.

DISCUSSION AND IMPLICATIONS FOR POLICY MAKING

The findings from this study provide strong evidence that the type of monetary bond posted does not affect public safety or defendants' court appearance, but does have a substantial effect on jail bed use. Specifically, when posted, unsecured bonds (personal recognizance bonds with a financial condition) achieve the same public safety and court appearance results as do secured (cash and surety) bonds. This finding holds for defendants who are lower, moderate, or higher risk for pretrial misconduct. However, unsecured bonds achieve these public safety and court appearance outcomes while using substantially (and statistically significantly) fewer jail resources. That is, more unsecured bond defendants are released than are secured bond defendants, and unsecured bond defendants have faster release times than do secured bond defendants. The amount of the secured monetary bond was associated with increased pretrial jail use but not increased court appearance. Finally, the type of monetary bond did not affect the fugitive-return rate as measured by the percent of cases with a failure to appear warrant remaining open up to one-and-a-half years later.

THE TYPE OF BOND SET BY THE COURT HAS A DIRECT IMPACT ON THE AMOUNT OF JAIL BEDS CONSUMED, BUT IT DOES NOT IMPACT PUBLIC SAFETY AND COURT APPEARANCE RESULTS.

A three-jurisdiction example demonstrates this study's implications for jail bed use. If there were three jurisdictions that use different rates of unsecured and secured bonds, they each would use their local jail resource very differently to achieve the same public safety and court appearance outcomes.[11] Table 10 demonstrates this scenario.

Table 10: Differential Jail Bed Use Resulting from Different Bond Setting Practices in Three Jurisdictions

JURISDICTION	PERCENT OF UNSECURED BONDS	PERCENT OF SECURED BONDS	PRETRIAL BEDS NEEDED FOR UNSECURED BONDS*	PRETRIAL BEDS NEEDED FOR SECURED BONDS*	TOTAL PRETRIAL BEDS NEEDED*	PUBLIC SAFETY RATE**	COURT APPEARANCE RATE**
Status Quo[a]	31%	69%	34	430	**464**	79%	83%
Moderate Unsecured[b]	61%	39%	67	243	**310**	79%	83%
High Unsecured[c]	91%	9%	100	56	**156**	79%	83%

c. The "Status Quo" jurisdiction's use of unsecured bonds was selected to be the same as the average unsecured bond use in the 10 jurisdictions that contributed data to this study (see Table 2).
d. The "Moderate Unsecured" jurisdiction's percent of unsecured bonds was selected to be 30 percentage points higher than that of the Status Quo jurisdiction and centered between the other two jurisdictions. Its bond type percentages are nearly the inverse of the Status Quo jurisdiction.
e. The "High Unsecured" jurisdiction's percent of unsecured bonds was selected to be 30 percentage points higher than that of the Moderate Unsecured jurisdiction. It also uses nearly the same percent of unsecured bonds as there are defendants in the three lowest Colorado Pretrial Assessment Tool (CPAT) risk categories (i.e., categories 1, 2, and 3). This would approximately be the case, for example, if a jurisdiction were to use unsecured bonds for defendants whose pretrial risk score is in CPAT risk categories 1 through 3 and use secured bonds for defendants whose pretrial risk score is in CPAT risk category 4.
* Per 10,000 defendants booked into jail on new charges.
** The public safety rate of 79% and the court appearance rate of 83% were averages for all 1,309 released defendants, regardless of their bond type or risk level.

As seen in Table 10, secured bonds require more jail beds than do unsecured bonds when a relatively high number (69% or 39%) of secured bonds are used. In particular, the Status Quo jurisdiction would need 464 jail beds allocated for pretrial detention for every 10,000 defendants booked into jail on new charges, whereas the Moderate Unsecured jurisdiction would need 310 jail beds allocated for pretrial detention for this same pool of defendants.

11 The average length of time that defendants spent in detention for pretrial reasons (calculated for this study as 0.7 days for unsecured bond defendants and 1.5 days for secured bond defendants) and the average length of time of 58 days for all in-custody cases to close were used to calculate the number of beds that defendants would use. See Cunniff (2002) for the formulas used (p. 30).

The Status Quo jurisdiction's higher amount of jail bed use is caused by fewer secured bond defendants being released and when they are released, taking more time to do so when compared to unsecured bond defendants (refer back to Tables 5 and 7).

In contrast, the High Unsecured (i.e., high use of personal recognizance bonds) jurisdiction would need only 156 jail beds allocated for pretrial detention for every 10,000 defendants booked into jail on new charges. In this jurisdiction, more jail beds are actually required for unsecured bond defendants than for secured bond defendants because of the very high volume of unsecured bond defendants. However, this jurisdiction uses substantially fewer pretrial jail beds overall than do the other two jurisdictions because fewer defendants remain incarcerated, and when defendants are released, they are released much more quickly.

In summary, the High Unsecured jurisdiction achieves the same court appearance and public safety outcomes as does the Status Quo jurisdiction, but does so while reserving 197% more jail beds for other purposes (e.g., incarcerating sentenced inmates, reducing jail expenses by closing one or more housing sections). Similarly, the Moderate Unsecured jurisdiction achieves the same court appearance and public safety outcomes as does the High Unsecured jurisdiction, but consumes twice as many jail beds while doing so.

JURISDICTIONS CAN MAKE DATA-GUIDED CHANGES TO LOCAL PRETRIAL CASE PROCESSING THAT WOULD ACHIEVE THEIR DESIRED PUBLIC SAFETY AND COURT APPEARANCE RESULTS WHILE RESERVING MORE JAIL BEDS FOR UNMANAGEABLY HIGH RISK DEFENDANTS AND SENTENCED OFFENDERS.

Criminal justice policy-makers, such as judges, sheriffs and jail administrators, district attorneys, defense attorneys, and county commissioners or city council members, in each local jurisdiction (e.g., county or city-county) could benefit from convening to discuss and analyze their current practices and to identify opportunities for improving their pretrial practices. Colorado jurisdictions use secured money bonds for over two-thirds (69%) of their cases. However, this study provides compelling evidence that the same level of public safety and court appearance that these jurisdictions experience today can be achieved at considerably lower costs to taxpayers who fund local jails, and this finding occurs for defendants of all risk levels.[12] Moreover, this study's findings provide empirical support for a Colorado jurisdiction changing its pretrial practices to be consistent with Colorado's new bail statute enacted in May of 2013.[13]

It will be important for local decision-makers to collaborate to hold each other accountable to maximize their desired public safety, court appearance, and jail bed use outcomes. Judges, sheriffs, district attorneys, and other justice system decision-makers desire to achieve the highest levels of public safety and court appearance as possible, and they rely on county commissioners and legislators to provide them with the resources (e.g., jail and court facilities, staff, programs) to make those outcomes possible. Similarly, county commissioners or legislators fund the jail and program resources, and they rely on judges and other system decision-makers to engage in effective practices that most efficiently

12 The higher financial cost to each local jail created by the use of secured bonds can be demonstrated whether short-run marginal costs and/or step-fixed costs are used in cost calculations (see Henrichson & Galgano, 2013).

13 See House Bill 13-1236 at http://www.leg.state.co.us/.

use those resources. This study indicates that Colorado jurisdictions have the opportunity to be much more effective and efficient with the pretrial use of local jails by using an empirically-based risk assessment instrument such as the Colorado Pretrial Assessment Tool and by maximally using personal recognizance bonds with a financial condition. In this decision-making scenario, defendants' risk for pretrial misconduct would be known prior to defendants' release from custody, and all released defendants would have a personal recognizance bond with a financial condition that the court could enforce if the defendant were to fail to appear.

COLORADO JUDICIAL OFFICERS NOW HAVE DATA AND LAW TO SUPPORT CHANGING THEIR BAIL SETTING PRACTICES TO BE AS EFFECTIVE BUT MUCH MORE EFFICIENT.

This study does not address the question of whether or when judicial officers should use monetary bonds or not use them (i.e., bonds with a financial condition or bonds with no financial condition). That is a research question beyond the scope of this study and is not currently relevant in Colorado, given that statute requires all bonds to have a financial condition. Rather, this study's results, combined with the new bail statute enacted in May of 2013, provide Colorado judicial officers with both empirical and legal justification for changing their bail setting practices to achieve their desired levels of public safety and court appearance while incarcerating only higher risk individuals and no longer incarcerating lower risk defendants who cannot pay their cash or surety bonds. The pretrial release mechanism created in Colorado's new bail statute for achieving all of these outcomes simultaneously are personal recognizance bonds with an unsecured financial condition found in Colorado Revised Statutes Sections 16-4-104(1) (a) and (b). These bonds are the only ones in Colorado that simultaneously (1) allow judicial officers to set an amount of money that they believe may give defendants sufficient incentive to return to court, *and* (2) do not prevent those defendants' release because the amount is too high for them or their family or friends to post.[14]

The new statute and this study's findings also converge to imply two features of a money bond schedule if a jurisdiction's decision-makers choose to have one: (1) The schedule should have the defendant's risk integrated into the formula that is to guide or determine a specific monetary amount of bond for each individual defendant; and (2) the scheduled monetary amounts should only be used for financial conditions associated with recognizance bonds and not for cash or surety bonds. If these two features are not incorporated and integrated into money bail bond schedules and pretrial decision-making, then the jurisdiction is likely to achieve its desired public safety and court appearance outcomes while failing to minimize pretrial detention because of the number of lower risk defendants who will be incarcerated for their lack of pre-release financial resources.

This study shows that defendants who are released from jail on personal recognizance bonds with a financial condition return to court and avoid new charges at the same rate as do defendants who bond out on cash or surety bonds, and they are as unlikely to remain at-large on fugitive status. Nonetheless, as one pretrial legal scholar has proposed (T. Schnacke, personal communication, August 1,

14 The Colorado Commission on Criminal and Juvenile Justice's Bail Subcommittee discussed the possibility that defendants are more likely to appear in court when they have "skin in the game" because of a financial condition of their bond (see http://www.colorado.gov/cs/Satellite/CDPS-CCJJ/CBON/1251617151523). Several justice system decision-makers in other states have suggested the same to this author. This study could not test this hypothesis; however, this study does provide empirical support that if defendants are more likely to appear in court because of a financial condition, this "motivation" is achieved just as effectively with a personal recognizance bond with a financial condition than it is with a cash or surety bond, but without the accompanying unnecessary pretrial jail bed use.

2013), even if the fugitive-return rate were some degree higher for surety bond defendants than for unsecured bond defendants, criminal justice decision-makers in each jurisdiction would need to decide if this gain offsets other costs. Specifically, if commercial bail bondsmen were to return defendants to custody sooner than law enforcement does, these cases could be closed more quickly. However, this benefit needs to be weighed against the high financial cost the local justice system incurs from the pretrial jail bed use that results from the large percent of surety bond defendants who are never released from jail or who take much longer to be released when they are released.

Finally, the pretrial decision-making supported by this study and the new statute has a precedent in Colorado. In early 2010 during Jefferson County's Bail Impact Study, which was a pilot project in which judges set more recognizance bonds with the support from the local criminal justice coordinating committee, a First Judicial District Court Judge set personal recognizance bonds with a financial condition for 75% of defendants who appeared before him at initial advisement. This Bail Impact Study, among initiatives in other jurisdictions and an earlier version of the research done for this paper, ultimately led to the introduction and passage of House Bill 13-1236, which rewrote Colorado's bail statute to encourage more recognizance releases and to reduce unnecessary pretrial detention while still emphasizing public safety and court appearance.[15]

THIS STUDY'S FINDINGS ARE LIKELY MORE GENERALIZABLE TO JURISDICTIONS THAT USE BOND SETTING PRACTICES SIMILAR TO THOSE USED IN COLORADO.

Colorado jurisdictions' pretrial case processes are very similar to one another and are typical of the processes used nationwide. When defendants are booked into jail, typically within a day or two most of them have the opportunity to leave custody after posting their bond via a money bail bond schedule or after first appearing before a judicial officer. Colorado judicial officers use unsecured, cash, and surety bonds in varying proportions, but not in a "sequential' manner as is done in some jurisdictions. For example, Dallas County's (Texas) use of non-financial release occurs almost exclusively in instances when defendants cannot first post their secured bond (L. Gamble, personal communication, March 4, 2013). In Colorado, judicial officers order unsecured bonds regardless of defendants' initial ability to post a secured bond. This non-sequential use, combined with this study's statistical controls for defendants' pretrial risk level, allow for methodologically sound bond-type comparisons on public safety, court appearance, and jail bed use.

Finally, research methods similar to those used in this study should be replicated in jurisdictions outside of Colorado to determine to what extent similar findings emerge. Criminal justice officials in many jurisdictions outside of Colorado also heavily rely on secured money bonds without any data showing the effect, pro or con, of these secured bonds on all three pretrial outcomes simultaneously. These decision-makers could likely improve the efficiency of their systems without detriment to their public safety and court appearance outcomes by using more recognizance bonds with a financial condition in lieu of cash or surety bonds.[16]

15 See C.R.S. 16-4-103(4) (c) (2013), "The Court shall . . . consider all methods of bond and conditions of release to avoid unnecessary pretrial incarceration."

16 As previously noted, the effect on court appearance of recognizance bonds that have no financial condition compared to unsecured or secured bonds could not be examined in this study. If studies show that recognizance bonds with no financial condition outperform unsecured or secured bonds, then they would provide an effective release option for jurisdictions that seek, voluntarily or through statute or court rule, to impose the least restrictive conditions that assure public safety and/or court appearance.

REFERENCES

Bechtel, K., Clark, J., Jones, M. R., & Levin, D. J. (2012). *Dispelling the Myths: What Policy Makers Need to Know about Pretrial Research*. Washington, DC: Pretrial Justice Institute.

Block, M. K. (2005). *The effectiveness and cost of secured and unsecured pretrial release in California's large urban counties: 1990-2000*. Unpublished manuscript, University of Arizona.

Cohen, J. (1988). *Statistical Power Analysis for the Behavioral Sciences* (2nd ed.). Hillsdale, NJ: Erlbaum.

Cohen, T. H., & Kyckelhahn, T. (2010). *Data Advisory: State Court Processing Statistics Data Limitations*. Washington, DC: U.S. Department of Justice.

Cohen, T. H. & Reaves, B. A. (2007). *Pretrial Release of Felony Defendants in State Courts*. Washington, DC: U.S. Department of Justice.

Cunniff, M. A. (2002). *Jail Crowding: Understanding Jail Population Dynamics*. Washington, DC: U.S. Department of Justice.

Helland, E., & Tabarrok, A. (2004). The fugitive: Evidence on public versus private law enforcement from bail jumping. *Journal of Law and Economics*, 47, 93-122.

Henrichson, C., & Galgano, S. (2013). *A Guide to Calculating Justice-System Marginal Costs*. New York: Vera Institute of Justice.

Krahl, D. E., & New Direction Strategies. (2011). *An analysis of the financial impact of surety bonding on aggregate and average detention costs and cost savings in the state of Florida for 2010 by a single Florida insurance company: Continuities from earlier research and extensions in the development and utilization of statistical models to determine the utility and effectiveness of surety bonding*. Unpublished manuscript, University of Tampa.

Morris, R. G. (2013). *Pretrial Release Mechanisms in Dallas County, Texas: Differences in Failure to Appear (FTA), Recidivism/Pretrial Misconduct, and Associated Costs of FTA*. Richardson, TX: University of Texas at Dallas.

Osborne, D., & Hutchinson, P. (2004). *The Price of Government: Getting the Results We Need in an Age of Permanent Fiscal Crisis*. New York: Basic Books.

Pretrial Justice Institute & JFA Institute. (2012). *The Colorado Pretrial Assessment Tool (CPAT): A Joint Partnership among Ten Colorado Counties, the Pretrial Justice Institute, and the JFA Institute*. Washington, DC: Pretrial Justice Institute.

Professional Bail Agents of the United States. (2013). How to become a recovery agent. Retrieved May, 2013, from http://www.pbus.com/display-common.cfm?an=3

Jones, M. R., Brooker, C. M. B., & Schnacke, T. R. (2009). A Proposal to Improve the Administration of Bail and the Pretrial Process in Colorado's First Judicial District. Golden, CO: Jefferson County Criminal Justice Planning Unit.

Tabarrok, A. (2011). The bounty hunter's pursuit of justice. *Wilson Quarterly*. Retrieved May, 2013, from http://www.wilsonquarterly.com/article.cfm?AID=1775

ABOUT THE AUTHOR

Dr. Michael R. Jones has been a senior project associate at the non-profit Pretrial Justice Institute (PJI) since 2010. At PJI, he has assisted dozens of states and local jurisdictions in understanding and implementing more legal and empirically-based pretrial policies and practices. In Colorado, he led the project to develop Colorado's first empirically-based pretrial risk assessment tool, coordinated pretrial services programs' statutorily mandated performance measurement, and assisted justice system decision-makers in their efforts to defeat regressive legislation and pass progressive legislation. He currently provides strategic planning, training, technical assistance, and consulting to a variety of justice system stakeholders in Colorado and nationwide. Prior to PJI, he worked for nine years as a criminal justice planner and manager in Jefferson County, Colorado, where he was lead staff for the local criminal justice coordinating committee. He has also worked as a technical resource provider for the National Institute of Corrections since 2004, providing justice system assessments and assisting local jurisdictions in developing or improving their capacity for systemic collaboration and data-guided policy-making. Mike has a Ph.D. in Clinical Psychology from the University of Missouri-Columbia.