

IRS PRIVATE DEBT COLLECTION

Executive Summary

Introduction

Approach

Results

Analysis & Findings

Appendices

**Cost Effectiveness Study
March 2009**

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Executive Summary

In 2004, Congress passed legislation that allows the IRS to contract with Private Collection Agencies (PCAs) to assist in collecting delinquent tax debt. On October 22, 2004, President Bush signed the American Jobs Creation Act (AJCA) of 2004¹ which created sections 6306 and 7433A of the Internal Revenue Code permitting private sector debt collection companies to collect federal tax debts.

In September 2006 the IRS began the Private Debt Collection (PDC) Program, which uses PCAs to assist with the collection of delinquent taxes. A Cost Effectiveness Study (CES) was initiated in response to the Government Accountability Office (GAO) recommendation to investigate the investment in PCAs with an alternative collection program investment. The CES was designed to address the following two objectives:

- Analyze investment in the “next best use of funds” in a collection program; and
- Investigate the cost effectiveness of processing collection inventory through PCAs and through the IRS Automated Collection System (ACS).

The approach in conducting the CES involved creating a small scale simulation of two different investments in the IRS Automated Collection System (ACS) program. The simulation placed cases with ACS staff to estimate the cost of collection and compliance impact of working the cases. The study examined the “next best use of funds”, which was determined to be hiring additional ACS staff to work “high priority” inventory as identified by ACS. These are cases that ACS would work should additional resources become available. Inventory was also placed with ACS that contained cases generally similar to those worked by the PCAs and results were tracked. This second study component provides a snapshot view of the relative cost effectiveness of ACS and the PCAs on inventory with similar characteristics.

The study examined the performance of the two investments on four metrics:

- Cost per Dollar Collected
- Percent of Balance Due Collected
- Percent of Modules in Payment Status
- Taxpayer Satisfaction (results not isolated to inventory worked during study)

For inventory pulled from the same pool of cases assigned to the PCAs, study data show that ACS collected revenue at approximately \$0.07² per dollar collected, collected approximately 11% of the balance due placed, and had approximately 28% of the modules placed for the study move into payment status during the study period.

Based on inventory placed for the study, the PCA cost per dollar collected was approximately \$0.24³. The PCAs collected approximately 4% of the balance due placed with the study cases during the period under review. Approximately 13% of the PCA study inventory entered payment status during the study period.

¹ American Jobs Creation Act of 2004, Pub. L. No. 108-357, 118 Stat. 1418 (2004).

² Value for the cost per dollar collected was generated by the Variable Costing Methodology. See Appendix 2 for a complete explanation of Variable and Full Costing calculations.

³ Value for the cost per dollar collected was generated by the Variable Costing Methodology.

For inventory considered “the next best use of funds,” estimated ACS costs ranged from \$0.17 to \$0.25 per dollar collected⁴, depending on the type of inventory worked. ACS collected approximately 2% to 4% of the balance due placed with the test cases, and approximately 12% to 14% of the modules placed with ACS for the study entered into payment status during the test period. The PCAs do not work cases from the “next best use of funds” inventory.

In terms of Taxpayer Satisfaction, ACS produced an overall satisfaction rate of 92% and the PCAs produced a rate of 96%. The surveys administered for ACS and the PCAs are similar in nature but are two distinct surveys. The surveys address overall ACS and PCA operations, so the rates reported cover taxpayer cases beyond those included in the study.

⁴ These values for the cost per dollar collected were generated by the Variable Costing Methodology. See Appendix 2 for a complete explanation of Variable and Full Costing calculations.

I. Introduction

The IRS commissioned a Cost Effectiveness Study (CES) to review the use of Private Collection Agencies (PCAs) with a “collection strategy that officials determine to be the most effective and efficient overall way of achieving collection goals⁵.” A cross-functional team designed a study to capture cost and compliance data associated with working collection inventory through IRS Automated Collection System (ACS) programs and through the IRS Private Debt Collection (PDC) program. The study was designed to address the following objectives:

- Analyzing the “next best use of funds” in a collection program; and
- Estimating the cost effectiveness of processing collection inventory through PCAs and through IRS ACS programs.

The “next best use of funds” is the investment the IRS would make in collection activities should additional funding become available. For the purposes of this study, the “next best use of funds” was determined to be hiring additional ACS staff to work cases not presently being worked by the IRS.⁶ For the study, cases not currently being actively worked were placed with ACS staff in order to collect data to estimate the costs and revenue generated by working the cases.

To estimate the cost effectiveness of processing inventory through the PCAs and ACS, inventory was placed with ACS that contained cases similar to those being worked by the PCAs. An analytical framework was followed to provide a snapshot view of the relative cost effectiveness of ACS and the PCAs, with both programs working inventory with similar characteristics during the same time frame.

II. Approach

Cost and compliance data were tracked for the two different categories of cases placed with ACS and the PCAs:

- ACS High Priority Inventory: ACS was asked to identify inventory to be worked should additional resources become available. A cross-functional IRS team championed by ACS identified the Wage and Investment Division (W&I) I-2 inventory placed in September 2006 and the Small Business / Self-Employed Division (SB/SE) I-2 inventory placed in April 2007 as the “high priority” inventory the IRS currently lacks the resources to work.
- PDC Potential New Inventory (PNI): This is the work assigned to the PCAs. It is stratified into three types of inventory: Queue, Shelved and Unable to Contact/Unable to Locate (UTC/UTL). PNI inventory is not worked by ACS due to its low priority. However, for the purposes of this study, this inventory was assigned to ACS in April 2007.

The cases were placed in two phases: September 2006 and April 2007, and collection performance was tracked for 12 months after the cases were placed. ACS staff worked

⁵ GAO Report 04-492: *IRS Is Addressing Critical Success Factors for Contracting Out but Will Need to Study the Best Use of Resources (May 2004)*.

⁶ See Appendix 1 for a detailed explanation of inventory determination.

the cases assigned to ACS using existing Internal Revenue Manual procedures. The PCAs worked their inventory using existing PCA procedures and staff. Table 1 provides a summary of the inventory placed as part of the study.

Table 1: Inventory Placements

Placement Date	Inventory Description	ACS	PCA
September 2006	W&I I-2: "High Priority" ACS inventory not currently worked due to lack of resources	✓	
April 2007	SB/SE I-2: "High Priority" ACS inventory not currently worked due to lack of resources	✓	
	PDC PNI: Comprised of Queue, Shelved, and UTC/UTL cases. Inventory that is currently eligible for assignment to the PCAs but not actively worked by ACS due to its lower priority and risk.	✓	✓

For PDC PNI, care was taken to select inventory for the study that was generally representative of the kinds of cases worked by the PCAs at the time of the study. For instance, the PDC PNI inventory that was placed with ACS in April was pulled from the same pool of cases that was used to make PCA assignments that same month. The types of cases assigned are also similar to what PCAs currently work and will work in the near future. Other months and inventory were examined, but the selected inventory categories represent the inventory most likely to be worked by the PCAs in the future and the inventory that would most likely be worked by ACS given additional resources.

Appendix 1 describes in more detail the determinations made in selecting the inventory.

III. Results⁷

High-level statistics for the case placements with ACS for the "next best use of funds" investment are shown in Table 2-A. Data covering the cost effectiveness of ACS and PCAs processing inventory with similar characteristics are shown in Table 2-B. Results are reported for the following set of balanced metrics:

- The cost of collection is measured by the Cost per Dollar Collected⁸
- Compliance impact is measured by the Percent of Balance Due Collected and Modules in Payment Status (i.e., full pay or installment agreement)
- Taxpayer Satisfaction is based on a vendor survey for overall PCA and ACS operations, so the results are not limited to the cases placed in this study

Table 2-A and Table 2-B include dollars that were collected during the 12-month study period and the present value of Installment Agreements (IAs) that were initiated during the same period. The Present Value of installment agreements was calculated to help prevent the value of each IA from being understated. For example, if a 36-month IA

⁷ Many of the values reported as results are calculated estimates that may be based on sample data and assumptions. As such, these values are subject to both measurement and estimation error, and should not be viewed as precise measurements.

⁸ PCA cost consists of variable IRS direct personnel costs (direct and indirect time for the Referral Units and TAS) in support of PCAs plus PCA commissions. A complete discussion of how costs and dollars collected are calculated is included in Appendix 4.

was initiated at the start of the study and the IA did not default, only 12 months of the 36 payments would be captured in the study. In this scenario, the actual value of the IA would be up to three times the dollars collected during the study period. Not calculating the projected full value of IAs penalizes both ACS and the PCAs when an IA is secured.

To better capture the value of IAs, the Present Value (PV) of each IA⁹ is calculated. This calculation is based on the average duration of an IA, the average IA default rate, and the time value of money¹⁰. For ACS, the estimated present value of the future costs (e.g., notices, taxpayer contacts) of supporting active IAs was included. For PCAs, the present value of commissions from future IA payments was added to costs.

Table 2-A: High Level Results for “Next Best Use of Funds”

Inventory	Dollars Collected (estimated)	Cost ¹¹	Cost per Dollar Collected	Balance Due Placed	% Balance Due Collected	Modules Placed	Number of Modules in Payment Status	% Modules Placed in Payment Status	Taxpayer Satisfaction
W&I I-2 September	\$113,684	\$28,408	\$0.25	\$6.3 million	2%	362	45	12%	92%
SB/SE I-2 April	\$110,617	\$18,499	\$0.17	\$2.5 million	4%	543	74	14%	

Table 2-B: High Level Results for Cost Effectiveness of ACS and PCAs

Inventory	Dollars Collected (estimated)	Cost ¹²	Cost per Dollar Collected	Balance Due Placed	% Balance Due Collected	Modules Placed	Number of Modules in Payment Status	% Modules Placed in Payment Status	Taxpayer Satisfaction
ACS PNI April	\$775,302	\$53,545	\$0.07	\$6.8 million	11%	1,341	369	28%	92%
PCA PNI April	\$443,438	\$105,621	\$0.24	\$11.7 million	4%	2,133	284	13%	96%

⁹ See Appendix 4, Table 4-2, for a detailed explanation of this calculation.

¹⁰ Calculations for the time value of money discount future payments by the rate at which the government borrows capital. The rate of the 10-year Treasury note in the middle of the study (5%) was used.

¹¹ The approach used to capture costs associated with I-2 inventory varied across W&I and SB/SE in the study. Therefore, accurate cost comparison across the two I-2 inventories is not possible.

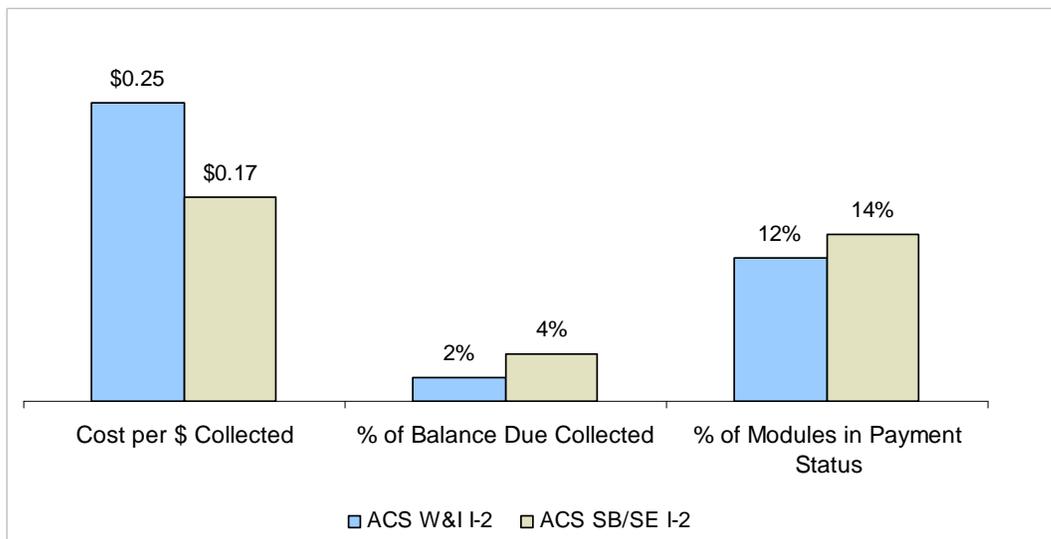
¹² The values for Cost and Cost / Dollar Collected were generated by the Variable Costing Methodology. See Appendix 2 for a complete explanation of Variable and Full Costing calculations.

IV. Analysis & Findings

This section provides high-level results across the primary metrics captured during the study.

ACS September W&I I-2 and ACS April SB/SE I-2

ACS was asked to identify “high priority” inventory it would work should additional resources become available. W&I I-2 and SB/SE I-2 inventory were identified and placed in September 2006 and April 2007 respectively. I-2 inventory requires additional account and taxpayer research and is not currently placed with the PCAs, so a side-by-side comparison between I-2 inventory and PNI inventory is not warranted. The following comparison provides a look at the performance of ACS across the two types of I-2 inventory.



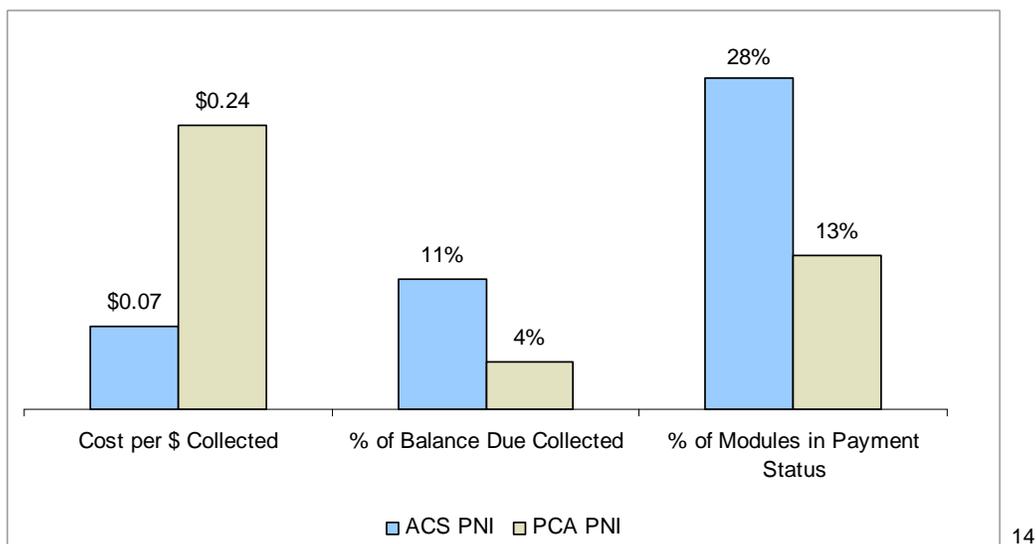
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Based on data collected during the study, the ACS W&I I-2 inventory appears to be the more expensive I-2 inventory to collect. The costs associated with working the I-2 cases were collected by IRS personnel within each ACS program. Different approaches for capturing costs were employed, so it is difficult to compare the cost of collection across the two inventories. In general, the SB/SE I-2 inventory outperformed the W&I I-2 inventory in cost per dollar collected, percentage of balance due collected, and the percent of modules in payment status. Further research would be required to validate and understand fully the reasons for the differences in study results between the two types of I-2 inventory.

¹³ In the chart, the values shown for *% of Modules in Payment Status* include modules for which the final payment was either a regular payment or an indirect payment, such as a refund offset or systemic levy payment. Revenue associated with indirect payments is not included in the other study results (i.e., Dollars Collected, Cost per Dollar Collected, % Balance Due Collected). These payments would have occurred without ACS or PCA treatment.

ACS April PNI and PCA April PNI

This analysis provides a snapshot view of the estimated cost effectiveness of processing collection inventory through PCAs and through the IRS Automated Collection System. Both programs worked inventory of similar characteristics during the same time frame. The inventory assigned during the study is generally representative of the inventory the PDC program has worked in the recent past and will work in the near future.



ACS cost is driven by the relatively low average hours worked per module placed. The low hours are a result of low inventory actions per module, such as live phone calls and correspondence. Study findings suggest two potential explanations for how ACS can collect revenue at a lower cost.

1. **Systemic Actions** – About 90% of the PNI modules went to other statuses such as R-5 (take initial levy action), I-8 (pre-levy action such as a final notice), and the C function (predictive dialer). Inventory in these statuses can generate collections through systemic actions that have relatively few costs.
2. **Enforcement Actions** – Unlike PCAs, ACS has the authority to issue liens and levies, garnish wages, or perform other enforcement actions that collect debt independent of taxpayer engagement. The potential that enforcement action could be taken may also induce taxpayers to resolve their debt. These actions may result in revenue that may otherwise go uncollected by the PCAs.

¹⁴ In the chart above, the values shown for *% of Modules in Payment Status* include modules for which the final payment was either a regular payment or an indirect payment, such as a refund offset or systemic levy payment. Revenue associated with indirect payments is not included in the other study results (i.e., Dollars Collected, Cost per Dollar Collected, % Balance Due Collected). These payments would have occurred without ACS or PCA treatment.

Taxpayer Satisfaction

W&I and SB/SE ACS taxpayer satisfaction for the October 2006 to March 2008 period averaged 92%. PCA taxpayer satisfaction for the September 2006 to March 2008 period averaged 96%. The score is based on taxpayer response to the question, "Everything considered, whether you agree or disagree with the final outcome, rate your overall satisfaction with the service you received today." The survey is conducted by the same vendor utilizing similar methodologies for both ACS and the PCAs.

The ACS score is based on Servicewide ACS data that covers a broad range of inventory types. The PCA score is based on data that covers the PDC program's total inventory placed. The survey results for both the PCAs and IRS ACS are favorable. Data are collected from two distinct surveys administered to separate audiences, so it is inappropriate to draw statistical significance from the difference in the two scores.

Appendix 1: Inventory Determination

A working group was convened consisting of IRS representatives from the Small Business / Self-Employed and Wage and Investment Operating Divisions and the Filing and Payment Compliance Modernization Office (the area responsible for the PDC Program) to make recommendations for the “next best use of funds”.

A guiding principle was to consider inventory that was feasible to implement if additional resources were available. Based on working group discussions, four options were identified for evaluation; these options are presented in Table 1-1.

Table 1-1: ACS High Priority Inventory Options

Alternatives	Description
SB/SE Next Best Case (A) (Placement April 2007)	Apply additional resources to work the next best case priority that SB/SE ACS currently is unable to work with the resources available, but <i>would</i> work if additional resources were available <ul style="list-style-type: none"> ▶ BMF TDA Cases from the Queue increasing the dollar threshold for ACS work to <\$100K
SB/SE Next Best Case (B) (Placement April 2007)	Apply additional resources to work the next best case priority that SB/SE ACS currently is unable to work with the resources available, but <i>would</i> work if additional resources were available <ul style="list-style-type: none"> ▶ I-2 TDA IMF cases have been identified as the next best case working by highest priority code with the most recent follow-up dates
W&I Next Best Case (Placed September 2006)	Apply additional resources to work the next best case priority that W&I ACS currently is unable to work with the resources available, but <i>would</i> work if additional resources were available <ul style="list-style-type: none"> ▶ I-2 TDA <\$100K
Work more of the same inventory	Increase the number of cases coming into the <i>current</i> ACS priorities (ie. ASFR, AUR, etc)

These options were evaluated against criteria defined by the working group and recommendations were presented for management approval. The working group determined the criteria in Table 1-2 as the appropriate evaluative criteria for selecting the “high priority” inventory under this study.

Table 1-2: Evaluative Criteria

Criteria	Description
Ease of Implementation	<ul style="list-style-type: none"> ▶ Assessment of the extent of programming required to implement as part of the cost effectiveness study ▶ Assessment of the extent of procedural changes needed to implement within the cost effectiveness study
Data Availability	<ul style="list-style-type: none"> ▶ Complexity of obtaining data to support the study ▶ Ability to use historical data vs. placing cases into the ACS work stream to collect
Priority/Importance	<ul style="list-style-type: none"> ▶ Assessment of the importance for the organization to measure the performance of cases or apply effort to the case types identified ▶ Is a realistic option for implementation if resources were available

Based on the evaluation of the options against the criteria, the high priority inventory was determined to be SB/SE Next Best Case (A), SB/SE Next Best Case (B), and W&I Next Best Case. Although SB/SE Next Best Case (A) was determined to be a good candidate for the study, logistical and procedural challenges prevented this inventory from being included in the study. The SB/SE Next Best Case (B) and W&I Next Best Case were assigned to ACS with results included in the study.

The study also required the placement of cases similar to those cases placed with the PCAs which consist of the following inventory:

- Cases that are part of the Queue (Status 24)
- Cases that were systemically Shelved by IRS due to a lack of resources (530 cc39)
- Cases identified by IRS as Unable to Locate or Unable to Contact (530 cc03/12)

Appendix 2: Placement Planning

The previous Appendix explained the inventory types included in the study. This Appendix covers the size of the samples drawn for the study and how the tax modules were selected from the PNI. Additionally, the performance of each inventory sample was evaluated with common statistical tests.

Sample Size

For the W&I and SBSE I-2 inventory groups, the CES working team wanted to ensure that the number of cases placed was large enough to draw statistically valid conclusions, yet not so large that significant IRS resources would be required to implement the study. The target number of modules was 500 for each group. Initially, more than 500 modules were drawn in order to account for potential loading errors (see Appendix 3 for detailed procedures). System loading errors reduced the number of W&I I-2 modules below the targeted 500 sample size.

Based on lessons learned from sampling the I-2 inventory groups, larger samples were drawn from PNI. More than 1,500 PNI modules were pulled for ACS and the PCAs. System loading errors caused the ACS PNI sample to drop below the 1,500 initial target. The sample was still sufficiently large to estimate overall inventory performance.

Case Selection

To select study cases for ACS and PDC, a stratified random sampling methodology was used to pull the I-2 and PNI cases for each of the IRS inventory groups. In this type of sampling there are two steps: 1) develop a typical pool of cases, and 2) distribute these cases in a random fashion to each collection program.

For the PNI cases, a pool of 3,474 cases was selected from the PNI using the same methodology that the PDC program uses each month to provide case information to the PCAs. This provides a variety of cases with total module balances up to \$100,000. The second step to distribute the cases required a sorting mechanism that provided each collection program a random allotment of cases. The last two digits of the Taxpayer Identification Number (TIN) designated which group would work the entity's modules. Based on the numbering scheme used for TINs, the sample set of cases sent to each collection program should be random for the CES.

To estimate whether or not ACS and PDC received similar cases, a statistical test was run. The test selected was an analysis of variance, or ANOVA, on the average module balances of each sample. Based on the test, at the 90% confidence level, each group received enough similar cases that it is believed that neither group's sample profile would skew study findings.

For ACS I-2 cases, a query was run to create a pool of I-2 ACS cases. Of the pool of 48,000 I-2 cases available, a stratified random sampling methodology was used to select 500 cases (modules) with unique TINs. IDRS transactions were then posted to these accounts so that they could be tracked for the study.

Statistical Tests

Based on the number of cases placed, and the differences between the types of cases that made either a full payment or entered an installment agreement, we developed confidence intervals for the collection rates. The table below shows how these confidence intervals vary for each type of inventory. Were this study conducted a second time, the statistical tests reveal that there is a 95% chance that the results would fall within the ranges shown below. Please note that the dollars collected do not include the Present Value of installment agreements, because it is not possible to conduct these tests with that data included.

Table 2-1: Confidence Intervals¹⁵

Measure	High Priority W&I I-2 TDA	High Priority SBSE I-2 TDA	ACS PNI	PCA PNI
Dollars Collected	\$65,455	\$76,670	\$365,772	\$356,014
Avg. Dollars Collected Per Module	\$181	\$141	\$253	\$163
Standard Deviation ¹⁶	\$1,239	\$596	\$1,540	\$1,536
Confidence Interval	\$53 - \$308	\$91 - \$191	\$174 - \$332	\$97 - \$228
% of Total Module Balance Collected - Low	0.3%	2.0%	3.5%	1.8%
% of Total Module Balance collected - High	1.8%	4.2%	6.7%	4.1%

Alternative Costing Methodologies

Variable Costing Methodology

For ACS, the Variable Costing Methodology includes ACS employee direct and indirect time for those employees that actually worked study inventory. The annual labor cost or FTE expense utilized is based on salary and benefits only. No management oversight or information technology (IT) costs were included in the cost per dollar collected calculations. Telecom costs associated with toll-free ACS phone calls and mailing and postage costs associated with ACS notices were estimated and added to ACS labor costs based on the estimated frequency of phone calls and notices employed to inventory placed for the study. The ACS labor, telecom, and IRS notices associated with supporting IAs in future years were estimated and discounted using the same approach applied to IA dollars collected.

PCA costs were calculated to include commissions earned on dollars collected as well as salary and benefit costs for IRS personnel in the Kansas City and Philadelphia Referral Units, as well as costs associated with staff in the Taxpayer Advocate Service (TAS). No other IRS oversight costs or MITS related expenses were included in the PCA cost per dollar collected calculation.

¹⁵ Statistical analysis was performed on the initial module placements (see Appendix 3 for changes to the placements), and as such will not necessarily match average module balance information displayed in other areas of the report.

¹⁶ The standard deviation is noticeably higher than the average payment. Most of the payments were zero—taxpayers in the sample made no payment. At the same time, some full payments were upwards of \$70,000. This large variance from the mean results in a high standard deviation.

The rationale for the Variable Costing Methodology is to include expenses that would vary depending on an increase or decrease in inventory assigned to either ACS or the PCAs. The cost per dollar collected values used in this report for ACS and the PCAs were calculated using the Variable Costing Methodology.

Table 2-2: Variable Costing Methodology

Measure	ACS			PCA
	W&I I-2 September	SB/SE I-2 April	PNI April	PNI April
Dollars Collected	\$113,684	\$110,617	\$775,302	\$443,438
Cost	\$28,408	\$18,499	\$53,545	\$105,621
Cost / Dollar Collected	\$0.25	\$0.17	\$0.07	\$0.24

Full Costing Methodology

For ACS, the Full Costing Methodology includes ACS costs associated with the variable method and then increases labor costs by 75% to account for added administrative and overhead expenses. This is a standard percentage used by officials within the IRS to estimate the fully burdened cost of a program. It would include technology, rent, management, travel, training, supplies, and other such program overhead costs.

PCA costs were calculated to include commissions earned on dollars collected along with an estimate of full IRS expenses related to the program. These IRS costs would include expenses related to the Referral Units, Taxpayer Advocate Service, and IRS PDC program support staff. Also included are expenses related to technology. The Full Costing Methodology is meant to capture the value of all IRS resources (variable and fixed) currently dedicated to supporting the Private Debt Collection program.

Table 2-3: Full Costing Methodology

Measure	ACS			PCA
	W&I I-2 September	SB/SE I-2 April	PNI April	PNI April
Dollars Collected	\$113,684	\$110,617	\$775,302	\$443,438
Cost	\$48,652	\$31,300	\$88,445	\$211,996
Cost / Dollar Collected	\$0.43	\$0.28	\$0.11	\$0.48

The Analysis & Findings section of the report and Executive Summary utilize the Variable Costing Methodology.

Appendix 3: Procedural Overview

Collection Procedures

Multiple procedural options were considered, from having ACS work cases using PCA-like procedures (i.e., limiting lien and levy actions) to creating a new set of procedures just for the cases in the study. The cross-functional study team determined that the most cost-effective procedures for ACS were those already outlined in the Internal Revenue Manual (IRM).

Some minor deviations from the IRM were required to accelerate the process of getting these cases into the ACS work stream.

- When loaded into ACS, cases would be worked according to the IRM for that inventory.
- Initial actions on the cases (e.g., locator research and out calls) would be made by specified personnel in ACS who had sufficient experience.
- Incoming correspondence and phone calls from the taxpayers would be routed to the ACS contact center and would not be redirected to the group which performed the initial actions on the case.
- IRS could employ enforcement tools (e.g., liens and levies) as prescribed by the IRM.

PCAs were allowed to use their existing procedures for working cases. New procedures or additional authority were not provided since this could cause their performance to vary from what is normally observed in the PDC program.

The procedures ACS used to work their inventory are outlined below.

Table 3-1: W&I I-2 Inventory

Case Type	W&I IMF Status 22 ACS I-2, TDA, Bal Due <\$100K Priority Code 0,1
Placement Date	September 2006
Location initially worked	Kansas City ACS Support Group
Date locator research began	Second week of September 2006

Once cases were placed with the W&I ACS Support Group in Kansas City, locator research was performed and initial outbound calls were made. Because these cases are considered lower priority work, initial locator research and outbound telephone calls were accelerated so that these cases could begin processing. Any inbound calls from the taxpayer were answered by the appropriate ACS call site. **IRM 5.19.5.6.2 I2 – Attempts to Locate Taxpayer** are the procedures used to work these cases. When telephone numbers were found, then outbound calls were made in an attempt to reach the taxpayer as well as appropriate notices sent.

Table 3-2: SB/SE I-2 Inventory

Case Type	SB/SE IMF Status 22 ACS I-2, TDA, Bal Due <\$100K Priority Code 0,1
Placement Date	April 2007
Location initially worked	ACS Support, Philadelphia
Date locator research began	Last week in April 2007

Once cases were placed with the ACS Support Group in Philadelphia, locator research was performed and initial outbound calls were made. Because these cases are considered lower priority work, initial locator research and outbound telephone calls were accelerated so that these cases could begin processing. Any inbound calls from the taxpayer were answered by the appropriate ACS call site. **IRM 5.19.5.6.2 I2 – Attempts to Locate Taxpayer** are the procedures used to work these cases. When telephone numbers were found, then outbound calls were made in an attempt to reach the taxpayer as well as appropriate notices sent.

Table 3-3: PDC PNI Queue Inventory

Case Type	IMF, Status 24, TDA, Multiple module balance due, Balance due <\$100K
Placement Date	April 2007
Location initially worked	W&I - ACS Support, Fresno SBSE – All sites
Date locator research began	Last week in April 2007

Once the cases were selected, they were reactivated to ACS where they systemically moved to the appropriate ACS inventory based on the characteristics of each case. The test cases were not given higher priority to ensure that they received maximum effort; instead, routine ACS processes were used to work these cases, competing against the rest of the ACS workload (in the Wage & Investment Operating Division, there are approximately 1.5 million entities, many of which carry active levy sources). Below is the breakdown of how these initial cases were distributed by priority:

- If a levy source was available, the account went to I-8 (6% of the sample) for an LT11 collection due process (CDP) notice if that action was required (no prior CDP notice, signified by a Transaction Code (TC) 971-069, was present on each module) or to R-5 (28% of the sample) for initial levy action. Once in a levy inventory, systemically generated levies are issued based on routine ACS processing.
- If no levy source was available but a telephone number was present, the case flowed to the appropriate C inventory (C-3 for 11% of the sample and C-4 for 45% of the sample) for an outgoing call using predictive dialer support. In addition to any calls generated via predictive dialer, about 20 high priority cases received manual outcalls from Fresno's ACS Support Operation staff. **Note:** Accelerating the outcall and using staff to manually generate the call is a departure from routine ACS procedures done at the request of the PDC team.

- If no levy source or phone number was available, the case flowed into I-2 (6% of the sample) inventory. Locator research was completed by Fresno's ACS Support staff within a week of receiving the work, expending about 20 hours on this activity. **Note:** Accelerating I-2 locator research is a departure from routine ACS procedures done at the request of the PDC team.
- Once these initial actions were completed, the cases moved to appropriate follow-up inventories within ACS for action once the follow-up dates arrive. That next action may be done systemically or through manual inventory work conducted by each ACS Call Site. How soon a case is worked manually depends on its priority code and the site's ability to work inventory. ACS activity is heavily weighted toward incoming calls. If test cases generated an incoming call, the appropriate action was taken at the time the contact occurred. If correspondence was received, it was processed by ACS Support along with other ACS incoming mail.

The ACS Support Group in Fresno performed initial locator research as necessary and made initial outbound calls where appropriate. The following IRM references contain the detailed procedures for how these cases were worked: 5.19.5.6.7 – I-8, 5.19.5.5.5 – R-5, 5.19.5.3.8.2 – C-3 and C-4, 5.19.5.6.2 – I-2.

Table 3-4: PDC PNI Shelved Inventory

Case Type	IMF, Currently Not Collectible (CNC) - 530 cc39, TDA, Multiple module balance due, Balance due <\$100K
Placement Date	April 2007
Location initially worked	W&I - Fresno ACS Support SBSE – All sites
Date locator research began	Last week in April 2007

Similar to PDC PNI Queue inventory, the cases for PDC PNI Shelved inventory were reactivated to ACS where they systemically moved to the appropriate ACS inventory based on the characteristics of each case. The procedures used for PDC PNI Shelved inventory are the same as those used for PDC PNI Queue inventory.

Below is the breakdown of how these initial cases were distributed by priority:

- C-3 – 14%
- C-4 – 12%
- I-2 – 29%
- I-8 – 4%
- R-5 – 5%
- 2% were removed from the sample because they were either full paid prior to placement or were transferred to the Field

For PDC PNI Shelved inventory, 34% of the cases were transferred to the Queue (Status 24) when they were systemically reactivated to ACS. To work these cases, the cases must stay in Status 22, so the cases were reloaded to ACS and worked throughout the SB/SE enterprise based on routing plans already in place.

Table 3-5: PDC PNI UTC/UTL Inventory

Case Type	IMF, CNC - 530 cc03/12 (Unable to Contact/Unable to Locate), TDA, Multiple module balance due, Balance due <\$100K
Placement Date	April 2007
Location initially worked	W&I - Fresno ACS Support SBSE – All sites
Date locator research began	Last week in April 2007

Similar to PDC PNI Queue inventory, the cases for PDC PNI UTC/UTL inventory were reactivated to ACS where they systemically moved to the appropriate ACS inventory based on the characteristics of each case. The procedures used for PDC PNI UTC/UTL inventory are the same as those used for PDC PNI Queue inventory. Below is the breakdown of how these initial cases were distributed by priority:

- C-3 – 23%
- C-4 – 18%
- I-2 – 27%
- I-8 – 15%
- R-5 – 2%

For PDC PNI UTC/UTL inventory, 15% of the cases did not load into Status 22. Some of these cases were full paid or sent to the Field. However, the majority of the cases that did not load either experienced an error in loading or were automatically transferred to Deferred (Status 23) or the Queue (Status 24). Because the sample size was still large enough to draw conclusions without reloading these cases, they were removed from the study.

Appendix 4: Analytical Design

The results of the case placements with the IRS and PCAs are measured using the following metrics:

- Cost per Dollar Collected
- Percent of Balance Due Collected
- Percent of Modules in Payment Status
- Taxpayer Satisfaction score based on the vendor survey for overall PCA and IRS ACS operations

Cost per Dollar Collected

Appendix 2 describes the difference between the Variable and Full Costing Methodologies. Total labor costs for ACS, the Referral Unit (RU), Oversight Unit (OU), and the Program Office include both direct time and indirect time. Direct time is time spent actually working cases or time working on the initiative. Indirect time accounts for annual leave, sick leave, training, administrative time, etc., and is added to the overall cost calculation to better capture the true cost of the associated labor. IRS and PCA costs utilized for the study are described in Table 4-1 below.

Table 4-1: Calculation Details

Category	Calculation
IRS ACS Costs	<ul style="list-style-type: none"> ▶ Number of hours worked by ACS staff (direct time) increased by associated indirect time * (times) hourly wage utilizing FTE based on salary and benefits. ▶ Fifty cents in telecom expense is associated with every 24 minute phone call. ▶ Total notice costs associated with IRS inventories (not counting IA notices) are: PNI = \$2,665, W&I I-2 = \$1,114, SB/SE I-2 = \$891. ▶ For all IRS IAs, the following support assumptions apply: one notice to establish each IA, 12 monthly notices over course of a year, two notices if an IA defaults, notice cost is \$0.50 each, two phone calls per active IA per year at a cost of \$0.50 in telecom costs and 24 minutes in direct labor per phone call. <p>Variable Costing Methodology. The Full Costing Methodology increases labor costs by 75%. See Appendix 2.</p>
PCA Costs	<ul style="list-style-type: none"> ▶ IRS Support Cost + PCA Commissions <ul style="list-style-type: none"> ▶ IRS Support cost = Salary and benefit costs for the Referral Units and TAS / Projected number of cases placed PDC-wide in FY08 * Number of cases placed for study (Variable Costing Methodology) ▶ IRS Support cost = Total costs for the Referral Units, TAS, Oversight Unit, Program Office, MITS / Projected number of cases placed PDC-wide in FY08 * Number of cases placed for study (Full Costing Methodology) ▶ PCA Commissions = Aggregate commission rate * dollars collected
Dollars Collected	<ul style="list-style-type: none"> ▶ Dollars from Full payments or Partial Payments + present value of installment agreements <ul style="list-style-type: none"> ▶ Payments must have transaction code (TC) 610 or a (TC) 670 ▶ Reversals which are denoted by a TC 611, 612, 613, 671, 672 or 673 are also included

The study does not include costs that have already been incurred to setup the PDC program or IRS ACS operations. The reason for excluding “sunk” costs is because they cannot be recovered regardless of future decisions on alternative investments.

Collections include both full payments and Installment Agreements (IAs). The value of full payments are included in calculations. However, for the IAs, the present value of IAs was used instead of the actual payments received on those IAs because it is a more accurate reflection of the value created by the treatment. Since the study period is only one year but most IAs extend beyond one year, only including actual payments received during the study period would underestimate the future expected value of the IAs. The Present Value of an IA is the value of the entire installment agreement in today’s dollars. To estimate the agreement’s future collections, we considered the agreement’s period, likelihood of default, and discounted cash. This calculation is described in more detail in Table 4-2 below.

Table 4-2: IA Present Value Calculation

Steps	Approach
Calculate the average balance due for all IAs	<ul style="list-style-type: none"> ▶ Sum up each IA total and divide by total number of IAs = \$4,941¹⁷
Accounting for defaults ¹⁸	<ul style="list-style-type: none"> ▶ If no defaults were assumed, the annual cash flow would be an Average IA balance due/Average IA length in years = \$1,647 ▶ Beginning Amount for YR 1: \$1,647 ▶ End amount for YR 1: \$1,647 * (1-26.85%) = \$1,205 ▶ Mid-year default average: (\$1,647 + \$1,205) / 2 = \$1,426 ▶ Repeat process, with beginning amount for next year equaling end amount in previous year (\$1,205)
Calculating the Present Value of IAs	<ul style="list-style-type: none"> ▶ Calculate the present value off the mid-year default average: <ul style="list-style-type: none"> ▶ $\\$1,426 / (1+.05)^{.5} = \\$1,392$. Raise the calculated value to .5 to account for time period (.5 year); for YR 2, it will be 1.5, and YR 3 it will be 2.5 ▶ The average present value (\$3,036) is then multiplied by the number of IAs established (19) to arrive at the total average present value of all IAs ▶ The total average present value for all IAs is then added onto the total dollars collected
Backing out IA payments	<ul style="list-style-type: none"> ▶ To avoid double counting, all IA payments made were backed out <ul style="list-style-type: none"> ▶ To do so, we added each month’s IA payment, multiplied by number of months elapsed and subtracted the product from dollars collected
IA Maintenance Costs	<ul style="list-style-type: none"> ▶ The future support costs associated with IAs are based on the sending of paper notices, telephone costs and labor associated with each phone call. These costs are subject to the same IA default rate assumptions and present value calculations as above. <ul style="list-style-type: none"> ▶ IA initiation costs include \$.50 to notify taxpayer (one-time cost) ▶ Plus 12 notices per year, each at \$.50 and 2 telephone costs $12 * 0.50 + 2 * (0.50 + 24 \text{ minutes of labor}) = \\52 (variable), \$85 (full) ▶ Plus IA default notices, 2 per defaulted IA at \$0.50 (one-time cost). The future cost of default is estimated using an expected value of 26.85% of

¹⁷ Numbers are drawn from the IRS September Placement data and are illustrative of the methodology used across all placements.

¹⁸ Yearly calculations occur in the beginning of YR1 and the beginning of YR2 and defaults are assumed to occur in the middle of the each calculated year.

	the \$1.00 total cost for each remaining IA (similar to the revenue collection calculation above).
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The study team also looked at incorporating the expected value of liens issued by ACS. Liens are an enforcement tool that ACS can utilize by attaching all present and future assets of the taxpayer. While various functions within IRS have this enforcement tool available to them, the PCAs do not have the ability to file liens. In most cases, liens are unlikely to generate any payments during the study period but may result in a payment years later (such as when a taxpayer tries to sell the real property). After careful consideration, it was decided not to incorporate a Present Value for liens since there were insufficient data to estimate the revenue impact accurately. Therefore, while lien costs were incurred by ACS during the study period (PNI: \$1,400, W&I I-2: \$1,650, SB/SE I-2: \$1,015, all values estimated), they are not included in ACS costs since there is no revenue associated with this treatment in the study.

Percent of Balance Due Collected

This computation is based on the total amount of dollars collected (including the Present Value of all IAs) divided by the total balance due dollar value of the inventory placed. For example, the total amount ACS April PNI collected was \$775,302 which when divided by the total balance due placed of \$6.8 million yielded a percentage of balance due collected of 11%.

Percent of Modules in Payment Status

This computation combines the total number of modules that were either paid in full or were put on an installment agreement during the period of the study, divided by the total number of modules placed in the inventory group as a whole. For example, the April PCA PNI had a total of 284 modules that were either paid in full or were put in installment agreement status. If we divide these 284 modules by the total number of modules in the April PNI (2,133), we have 13% of the modules in payment status.

Table 4-3: Full Pays and Installment Agreements

Measure	ACS			PCA
	W&I I-2 September	SB/SE I-2 April	PNI April	PNI April
Full Pays	26	40	111	200
Installment Agreements	19	34	258	84

Taxpayer Satisfaction (vendor survey for PCA and IRS operations)

The IRS has contracted with Pacific Consulting Group (PCG) to conduct its taxpayer satisfaction surveys for various operating divisions, including ACS. It also used PCG to create a survey for the PCAs. After completing a telephone contact with an employee of either ACS or a PCA, a random selection of taxpayers are offered an opportunity to respond to a survey that measures their overall satisfaction with how the transaction was conducted. Since the methodology and delivery systems for the PCAs and ACS are not identical, the scores should not be compared. They are offered in this study as examples that within their separate operations, both the PCA and ACS are receiving high scores for taxpayer satisfaction.

Table 4-4: Calculating Cost, ACS Hours Worked

Measure	September	April			
	W&I I-2	Queue	Shelved	UTC/UTL	SB/SE I-2
Hours Worked (rounded)	450	138	86	167	247

In order to calculate the above metrics, the following assumptions were used:

Table 4-5: Calculation Assumptions

Category	Assumption
IRS Costs	<ul style="list-style-type: none"> ▶ Estimate 1 IRS full-time equivalent (FTE) to be the equivalent of 2,080 hours: 54% direct time (1,123 hours) and 46% indirect time (957 hours) ▶ Cost of 1 FTE is estimated to be \$62,840 (salary and benefits only) ▶ Telecom costs are two cents per minute. ▶ The cost to send a single IA notice is \$0.50. ▶ A notice is required to establish an IA and two notices are sent following the default of an IA. ▶ Two phone calls per active IA are received each year, with each call taking 24 minutes to complete.
PCA Costs	<ul style="list-style-type: none"> ▶ Total cost used for IRS labor is based on a steady state estimate of \$2.22M which includes \$2.17M for the two Referral Units and \$57,357 for TAS (Variable Costing Methodology) ▶ Total IRS program costs including the two Referral Units, Oversight Unit, Program Staff, TAS and MITS, including overhead, estimated at \$11.2M (Full Costing Methodology) ▶ Commissions are 22% of dollars collected
Cost per Dollar Collected: IA Present Value	<ul style="list-style-type: none"> ▶ 3 year average IA duration ▶ Default rate of 26.85% ▶ 5% discount rate, based on the 10 year treasury note in July 2007

Table 4-6: Calculating Cost, ACS Case Transaction Assumptions

Measure	ACS Assumptions		
	Avg. Inventory Time	Avg. Case Time	Avg. Call Time
Minutes per Transaction (rounded)	10	24	24

Note: ACS direct labor was estimated through a manual case review. Time codes were not utilized to capture labor hours. The average minutes per transaction are based on estimates prepared by IRS ACS program staff using inventory handling time reports and call handling time reports.

Appendix 5: Glossary

Term	Definition
ACS	Automated Collection System. The people and technology used at IRS to collection delinquent tax debt via telephone and correspondence operations.
Age in Current Condition / Age in Status	The amount of time a tax module has been in the current IRS classification.
C Inventory (Status 22)	Classification for accounts that require contact by phone/correspondence from ACS.
CDP	Collection Due Process. Typical reference for a CDP notice. This notice gives the taxpayer the right to request a hearing regarding a lien filing or notice of intent to levy.
CNC Inventory (Status 53)	Currently Not Collectible. IRS classification for accounts that the IRS has deemed uncollectible due to a variety of reasons. One reason is hardship when the IRS will no longer pursue collection. Another is that IRS is unable to locate or contact the taxpayer. In these situations, the IRS will pursue collection if more information becomes available to reach the taxpayer.
CSED	Collection Statute of Expiration Date. The date beyond which the IRS can no longer legally collect on a tax debt. Typically 10 years unless an extension is filed.
Deferred Inventory (Status 23)	Accounts that have not been worked beyond initial collection activities because they do not meet IRS tolerance levels established for active inventory. Typically, the amount owed on these accounts is relatively low.
Entity	A taxpayer.
I Inventory (Status 22)	Account classification for ACS that denotes when additional research/investigation is needed (I for investigation).
IMF	Individual Master File. IRS database containing individual taxpayer accounts.
IRM	Internal Revenue Manual. Guide for IRS employees and stakeholders on how the IRS performs functions within the bounds of the federal tax code.
Module	How the IRS refers to an individual tax year on an account.
Multi Module Inventory	Accounts where the taxpayer has an outstanding liability for more than one tax year.
Potential New Inventory (PNI)	The list of accounts identified to meet the criteria for potential placement with Private Collection Agencies. The list is updated weekly and is used to assign cases worked through the IRS Private Debt Collection Program.
Priority Code	Designates the level of urgency or priority for working a delinquent account.
Queue Inventory (Status 24)	Accounts awaiting assignment to the collection field function but currently suspended.
R Inventory (Status 22)	Account classification for ACS that denotes when additional research is needed.
Shelved Inventory (530 cc39)	Accounts that are not being worked by IRS due to resource limitations.
Single Module Inventory	Accounts where the taxpayer has an outstanding liability for only one tax year.

Term	Definition
Substitute for Return	Involves a failure to file a return by the taxpayer. These returns are prepared by the government and assessed under IRC 6020(b) without the taxpayer's signature. Taxpayer's often file corrected returns at a later date which then involves validating the new return and making the adjustment on IDRS.
TDA	Tax Delinquent Account. A module where the taxpayer filed a return but has not fully paid their debt or has agreed with the IRS on a tax assessment and has not paid the debt.
TDI	Tax Delinquent Investigation. A module where the taxpayer has not filed a return.
UTL/UTC Inventory (530 cc03/12)	Unable to Contact/Unable to Locate. Classification for accounts where the IRS is not able to contact/locate taxpayers after researching available resources.