

Practice Aid for Testing Journal Entries and Other Adjustments Pursuant to AU Section 316

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Notice to Readers

The Center for Audit Quality (CAQ) was created to serve investors, public company auditors and the markets. The CAQ's mission is to foster confidence in the audit process and to aid investors and the capital markets by advancing constructive suggestions for change rooted in the profession's core values of integrity, objectivity, honesty and trust. The CAQ consists of approximately 800 member firms that audit or are interested in auditing public companies, and is affiliated with the American Institute of Certified Public Accountants (AICPA).

This publication has been prepared by representatives from the member firms of the CAQ and is intended to be used as a reference source for auditors of public companies when applying certain sections of AU Section 316 of the Public Company Accounting Oversight Board's (PCAOB) Interim Auditing Standards, Consideration of Fraud in a Financial Statement Audit. It specifically addresses the auditor's testing of journal entries and other adjustments for evidence of possible material misstatement due to fraud and is based on existing professional literature, the information gathered by members of the CAQ task force, and the experiences of CAQ member firms. This information represents the views of the members of the task force, does not set standards for any purpose, and has not been approved by any regulatory body or any senior technical committee of the AICPA. Auditors are required to adhere to AU Section 316 of the PCAOB's Interim Auditing Standards. Documents published by the CAQ, on the other hand, are not authoritative. If an auditor applies the materials included in a CAQ publication then he or she should be satisfied that, in his or her judgment, it is both appropriate and relevant to the circumstances of his or her audit. The materials and views herein are not intended as a substitute for the professional judgments applied by practitioners. The applicability and sufficiency of the material in particular circumstances are matters for such judgment.

This document is also not a substitute for the authoritative technical literature and users are urged to refer directly to applicable authoritative pronouncements for the text of the technical standards. Some sections in this document include quotations from authoritative technical literature. These quotations are intended only to illustrate certain matters and to help users locate certain information, not to serve as a substitute for careful study of the relevant pronouncements. The information that is the subject of this document may change in material respects, and the CAQ is under no obligation to update such information.



1 Introduction

1.1 Background

Evidence has shown that fraudulent financial reporting frequently involves the recording of fraudulent journal entries, particularly those involving post-closing adjustments and other types of nonstandard journal entries. Past accounting scandals such as the WorldCom case involving the inappropriate capitalization of operating expenses and other situations involving fraudulent revenue transactions have brought to light the pervasive risks of fraudulent journal entries. As a result, auditors' responsibility with respect to fraud, as presented in AU Section 316, *Consideration of Fraud in a Financial Statement Audit*, requires auditors to presume that the risk of management override of controls is always present and to test journal entries and other adjustments for indications of possible material misstatements due to fraud.

Members of the CAQ interviewed representatives of the eight largest registered public accounting firms and other regional and local registered public accounting firms concerning their views on the practical application of AU Section 316. These firms indicated that, while they believe AU Section 316 provides useful guidance to achieve the requirements of AU Section 316, additional practice aids would be of assistance in complying with the requirements of AU Section 316.

In addition, PCAOB's January 22, 2007 Release No. 2007-001, "Observations on Auditors' Implementation of PCAOB Standards Relating to Auditors' Responsibilities with Respect to Fraud," indicates that auditors face challenges in addressing and responding to the risk of management override of controls through testing of journal entries.¹

1.2 Intent of Practice Aid

The intent of this Practice Aid is to provide practical guidance for auditors with respect to testing, in accordance with AU Section 316, journal entries and other adjustments made by company management. AU Section 316 recognizes that "[m]anagement has a unique ability to perpetrate fraud because it frequently is in a position to directly or indirectly manipulate accounting records and present fraudulent financial information. Fraudulent financial reporting often involves management override of controls that otherwise may appear to be operating effectively."²

To address the risk of management override of controls, AU Section 316 requires an auditor to, among other things, "design procedures to test the appropriateness of journal entries recorded in the general ledger and other adjustments (for example, entries posted directly to financial statement drafts) made in the preparation of the financial statements."

¹ PCAOB Release 2007-001, Observations on Auditors' Implementation of PCAOB Standards Relating to Auditors' Responsibilities with Respect to Fraud," page 8

² AU § 316.08

³ AU § 316.58



Among the topics explored in this Practice Aid are:

- Obtaining an understanding of internal controls over journal entries;
- Selecting journal entries for testing, including the use of CAAT for selecting and evaluating journal entries;
- Evaluating selected journal entries; and
- Documenting the results of journal entry testing.

1.3 Existing Professional Literature

Detecting fraud in financial statement audits has been addressed previously in the professional literature. This literature includes *Statements on Auditing Standards* issued by the AICPA, Practice Aids and Practice Alerts published by the AICPA, releases by the PCAOB, professional reference manuals, and numerous articles and white papers. Some of this literature is listed in the table below for convenience. Users are urged to refer directly to applicable authoritative pronouncements for the text of the technical standards.

This Practice Aid is not intended as a substitute for the guidance set forth in the existing professional literature. Rather, it is intended as a reference source for registered public accounting firm auditors for purposes of the application of certain sections of AU Section 316. This document provides information which may be helpful for the design and performance of audit procedures to fulfill the requirements of AU Section 316 regarding the testing of journal entries and other adjustments. It also provides examples of some of the practices currently in use by firms.

Table 1 - Standards and Other Publications referred to in this Practice Aid

Reference	Issuer	Title
AS3	PCAOB	Auditing Standard No. 3 Audit Documentation
Release No. 2007-001	PCAOB	Observations on Auditors' Implementation of PCAOB Standards Relating to Auditors' Responsibilities with Respect to Fraud
AS5	PCAOB	Auditing Standard No. 5 An Audit of Internal Control over Financial Reporting That is Integrated with an Audit of Financial Statements
AU § 319	PCAOB	Consideration of Internal Control in a Financial Statement Audit
AU § 316	PCAOB	Consideration of Fraud in a Financial Statement Audit
Practice Alert 03-2	AICPA	Journal Entries and Other Adjustments
Practice Aid	AICPA	Fraud Detection in a GAAS Audit

2 Framework of Examining Journal Entries Pursuant to AU Section 316

2.1 General Steps in Testing Journal Entries

As described more fully in AU Section 316⁴ and the AICPA's Practice Alert 03-2, the testing of journal entries and other adjustments takes place in the context of a company's accounting and financial reporting process. The following steps involved in testing journal entries and other adjustments are addressed in this Practice Aid and generally occur in the following order:

Step 1: Consider the risks of material misstatement due to fraud identified in planning the engagement and their effect on the nature and extent of journal entry testing.⁵

Step 2: Obtain an understanding of the entity's financial reporting processes and the controls over journal entries and other adjustments.⁶

⁴ AU § 316.57 - .67

 $^{^5}$ As described at AU \S 316.35 - .42



Step 3: Perform audit procedures to determine the completeness of the population of journal entries and other adjustments.

- Step 4: Identify and select journal entries and other adjustments for testing.
- **Step 5**: Perform journal entry audit procedures, gather sufficient evidence, and document results.

2.2 Applying Professional Skepticism in Journal Entry Testing

AU Section 316 emphasizes the importance for the auditor to exercise professional skepticism when considering the risks of material misstatement due to fraud. Specifically, it states that "...the auditor should not be satisfied with less-than-persuasive evidence because of a belief that management is honest." This is important in selecting and testing journal entries and other adjustments because the purpose of these procedures is to detect instances of material misstatements due to fraud.

By exercising professional skepticism throughout the journal entry testing process an auditor may become aware that irregularities exist or that fraud may have occurred. For example, a company's answers to questions raised by the auditor during testing may be inconsistent with evidence collected or observations made. In some cases, answers to questions may simply strike the auditor as implausible or inconsistent with other findings. In these circumstances, the auditor proceeds in collecting persuasive evidence that will lead either to resolution of the issue or to further investigation.

Collecting persuasive evidence is particularly important when the auditor suspects that it is senior management who is attempting to override internal controls or process inappropriate journal entries. As described in AU Section 316 [without referenced footnotes]:

"If the auditor believes that the misstatement is or may be the result of fraud, and either has determined that the effect could be material to the financial statements or has been unable to evaluate whether the effect is material, the auditor should:

- a. Attempt to obtain additional evidential matter to determine whether material fraud has occurred or is likely to have occurred, and, if so, its effect on the financial statements and the auditor's report thereon.
- b. Consider the implications for other aspects of the audit (see paragraph 76).
- c. Discuss the matter and the approach for further investigation with an appropriate level of management that is at least one level above those involved, and with senior management and the audit committee.
- d. If appropriate, suggest that the company consult with legal counsel."8

⁶ AU § 316.59-60

⁷ AU § 316.13

⁸ AU § 316.77 (footnotes omitted) Auditors should also be aware of their responsibilities under Section 10A of the Securities Exchange Act of 1934. Also refer to AU Section 316.79 - .82



Testing for Fraud Pursuant to AU Section 316

The testing of journal entries and other adjustments for evidence of possible material misstatement due to fraud is addressed in AU Section 316:

"Material misstatements of financial statements due to fraud often involved the manipulation of the financial reporting process by (a) recording inappropriate or unauthorized journal entries throughout the year or at period end, or (b) making adjustments to amounts reported in the financial statements that are not reflected in formal journal entries, such as through consolidating adjustments, report combinations, and reclassifications. Accordingly, the auditor should design procedures to test the appropriateness of journal entries recorded in the general ledger and other adjustments (for example, entries posted directly to financial statement drafts) made in the preparation of the financial statements. More specifically, the auditor should:

- a. Obtain an understanding of the entity's financial reporting process and the controls over journal entries and other adjustments.
- b. Identify and select journal entries and other adjustments for testing.
- c. Determine the timing of the testing.
- d. Inquire of individuals involved in the financial reporting process about inappropriate or unusual activity relating to the processing of journal entries and other adjustments." 9

Importance of Internal Controls

It is important to emphasize that a company's internal controls surrounding the journal entry process will have an impact on the nature, timing, and extent of an auditor's testing of journal entries and other adjustments. Indeed, assessment of controls is often an integral component of the journal entry testing process. Internal controls that are commonly evaluated regarding journal entries are:

- Segregation of duties regarding the authorizing, posting, reviewing and reconciling of journal entries;
- Access rights controlling who is authorized and not authorized to record and approve journal entries in a company's accounting system;
- Oversight of the journal entry-posting process by members of management, internal auditors, or others, including post-entry review;
- Regular testing of controls, including those surrounding journal entries, by the company's internal auditors, if any.

Note: Some companies that lack an internal audit function and that lack sufficient segregation of duties might employ a knowledgeable member of the audit committee to oversee the journal entry process. Other

⁹ AU § 316.58

companies may require the internal audit department to perform journal entry testing on a quarterly or annual basis.

Example: Company procedures regarding the evaluation of controls over journal entries include those to assess:

- The company's financial statement period-end close process;
- The company's policies and procedures regarding the initiation, recording, and processing of standard and non-standard journal entries and other adjustments;
- Individuals responsible for initiating entries to the general ledger transaction processing systems, or consolidations;
- Approvals and reviews required for such entries and other adjustments;
- The mechanics for recording journal entries and other adjustments (e.g., whether entries are initiated and recorded online or in paper form) as well as the supporting documentation required;
- Controls, if any, designed to prevent and detect fictitious entries and unauthorized changes to journals and ledgers; and
- Controls over the integrity of the process used to generate reports used for audit purposes.

2.5 Effect of Internal Controls on Journal Entry Testing

Journal entry testing is a required procedure to be carried out by the auditor regardless of the size of the company being audited. However, as with other aspects of the audit engagement, audit procedures should be tailored to fit the circumstances of the audited company.

In conducting an audit under Auditing Standard No. 5 (AS5), *An Audit of Internal Control Over Financial Reporting That is Integrated with An Audit of Financial Statements*, the auditor would evaluate and test internal controls related to journal entries. This testing can be used in determining the nature, timing and extent of substantive testing of journal entries.

When the auditor has tested internal controls over the journal entry process (such as required approvals or access limitations to the accounting system) and found them to be effective, the auditor will likely rely on those controls when deciding the timing, nature, and extent of journal entries to test, regardless of the size of the audited company. This may lead to the conclusion that fewer rather than more journal entries be tested.¹⁰

¹⁰ See AU § 316.61 regarding "The effectiveness of controls that have been implemented over journal entries and other adjustments."

On the other hand, it is not uncommon with some smaller companies to find limited supervision or segregation of duties in certain accounting processes. These situations can create greater opportunities for fraudulent journal entries. In these circumstances where the auditor may place less reliance on a company's internal controls, the number of journal entries selected for testing may be larger. However, where the auditor conducts a primarily substantive audit of account balances, those substantive procedures may be considered in selecting journal entries for testing.

2.6 Inquiries of Company Employees

Company personnel other than management often will have first-hand knowledge of internal control weaknesses or potentially fraudulent entries. Therefore, AU Section 316 requires that auditors make inquiries of management and others, including internal auditors, of the audited company about the risks of fraud. In making the determination of whom, other than management, such inquiries should be directed to inquire about the existence or suspicion of fraud, AU Section 316.24 states that "......the auditor should consider whether others within the entity may be able to provide information that will be helpful to the auditor in identifying risks of material misstatement due to fraud—for example, others who may have additional knowledge about or be able to corroborate risks of fraud identified in the discussions with management or the audit committee...."

AU Section 316.25 identifies the following categories of employees considered in making these inquiries:

- Employees with varying levels of authority within the entity, including, for example, entity personnel with whom the auditor comes into contact during the course of the audit in obtaining (a) an understanding of the entity's systems and internal control, (b) in observing inventory or performing cutoff procedures, or (c) in obtaining explanations for fluctuations noted as a result of analytical procedures;
- Operating personnel not directly involved in the financial reporting process;
- Employees involved in initiating, recording, or processing complex or unusual transactions for example, a sales transaction with multiple elements, or a significant related-party transaction;
- In-house legal counsel.

Example: Auditors might consider inquiring of employees responsible for preparing journal entries, to determine if they have been asked to record entries they thought were improper and documenting such inquiries. For example, the auditor may inquire of employees in selected operating departments as well as the company's accounting and IT departments. Inquiries might address whether the employees were aware of

¹¹ AU § 316.20 - .27

any attempts by management to override or circumvent controls over journal entries. Auditors use judgment concerning the level of company employees from whom they may make inquiries.

Interviewing techniques and skills are important, and in some circumstances the auditor considers supplementing the engagement team by retaining the services of a forensic specialist to conduct certain interviews.

2.7 Using Forensic Specialists

Forensic specialists, including Certified Fraud Examiners (CFEs), can play an important role in the audit process by participating as a member of the engagement team and by providing objective input into the identification and evaluation of the risks of fraud.

Forensic specialists can be used in many ways, including "brainstorming" with auditors about how and where a company's financial statements might be susceptible to fraud, assisting in the evaluation of a company's internal controls related to journal entries and other adjustments, assisting in the selection and testing of journal entries to detect fraud and assisting in certain interviews of company personnel.¹²

Example: Some firms assign forensic specialists to each audit engagement where the audited company meets or exceeds certain risk criteria, for example, as with a company that has unusual or complex revenue transactions that present an opportunity for management to improperly record revenues, or for entities who's management has a history of using aggressive accounting policies. Forensic professionals are trained in the use of the firm's journal entry analysis programs to detect potentially fraudulent entries. Forensic specialists also may assist in conducting interviews of company management and staff when accounting irregularities or suspicions of fraud arise. For example, situations where use of a forensic specialist might be beneficial on an audit include instances where company management seems to be evasive in responding to auditors' inquiries and/or where collusion among members of management is suspected. Additionally, the auditor may consider the use of forensic specialists to assist in conducting interviews of management or key employees who have announced their departure.

3 Types of Journal Entries

The auditor's consideration of journal entries for testing encompasses all types of entries that record information into the general ledger and, in turn, the financial statements. This consideration includes entries that consolidate domestic and foreign subsidiaries. These entries are generally classified as follows:

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¹² AU §316.14 addresses the exchange of ideas or "brainstorming" among audit team members about how and where they believe the entity's financial statements might be susceptible to material misstatement due to fraud, how management could perpetrate and conceal fraudulent financial reporting and how assets of the entity could be misappropriated.



- **Standard, recurring entries**, which support day-to-day activities, are typically automated, posted directly to the general ledger, and originate from subsidiary ledgers (e.g., accounts receivable and payables).
- Non-standard entries may be recorded during the period-end closing process for purposes of adjusting, accruing, and estimating or to record unusual transactions. In contrast to standard, recurring entries, these entries can, for example, relate to accounting estimates for reserves and allowances, especially when they are manual entries.
- "Top-side" entries are those entries that generally do not appear as entries to the general ledger and, therefore, are not subject to standard system controls. In many cases, they are produced in a spreadsheet and maintained separately from the general ledger. These entries also can be recorded after the consolidation is completed, but before the financial statements are prepared.

Sections 4 Determining the Completeness of Journal Entries and Other Adjustments and 5 Selection and Testing of Journal Entries and Other Adjustments of this document describe the auditor's response to the risk assessments associated with various types of journal entries.

4 Determining the Completeness of Journal Entries and Other Adjustments

4.1 The AICPA's Practice Alert 03-2

Practice Alert 03-2 states:

"It is important in testing journal entries and other adjustments that the auditor be aware of and consider the entire population of journal entries and other adjustments. The auditor's ability to detect fraud is adversely affected if he or she is not assured of access to all of the journal entries posted and other adjustments made during the audit period. The auditor should be aware that journal entries and other adjustments may be made outside of the general ledger and should obtain a complete understanding as to how the various general ledgers are combined and the accounts are grouped to create the consolidated financial statements. . . The nature and extent of these procedures will depend on the engagement risk assessments and the company's systems for recording transactions." ¹³

¹³ AICPA Practice Alert 2003-02, Journal Entries and Other Adjustments, June 2003, paragraph .13



4.2 Obtaining the Entire Population of Journal Entries

4.2.1 AU Section 316 states that the auditor "... should obtain an understanding of the entity's financial reporting process and the controls over journal entries and other adjustments." ¹⁴

This understanding involves the identification of the sources and character of journal entries, including standard and non-standard journal entries that are made in the normal course of business throughout the year as well as adjusting entries that are recorded at period-end as part of the financial reporting process. Entries that are recorded in computerized accounting applications in the general ledger and subsidiary ledgers as well as those that are recorded manually generally are included in this understanding.

While most entries recorded in the normal accounting processes (e.g., sales and accounts receivable, purchasing and inventory, etc.) are automated, some entries may be entered manually, particularly those at period-end to record adjustments, estimates (e.g., for allowances for doubtful accounts or certain pension liabilities), or consolidations. The auditor gains an understanding of such items as:

- Who can initiate entries to the general ledger?
- What approvals are required for such entries?
- How are journal entries recorded? (For example, entries may be initiated and recorded online
 with no physical evidence, or may be created in paper form and entered in batch mode.)¹⁵
- **4.2.2** Identifying the population of journal entries may occur at a number of stages during the audit process, particularly when gaining an understanding of the entity's:
 - Financial reporting process;
 - Internal controls over journal entries and other adjustments.
- **4.2.3** Furthermore, the auditor considers the entire population of journal entries and adjustments recorded during the year, whether they were recorded electronically or manually. In most cases, manual journal entries are recorded at the end of periods, whether monthly, quarterly, or annually for purposes of adjusting accounts or estimating account balances.
- **4.2.4** Auditors may also consider journal entries processed within subsidiary ledgers (e.g., accounts receivable or accounts payable ledgers) and general ledgers at subsidiary organizations within the company.

Example: Certain recent frauds have been committed through the posting of journal entries either

15 AU § 316.59

¹⁴ AU § 316.58

multiple times or to multiple ledgers or both to avoid posting a single fraudulent journal entry for a large dollar amount. While visually inspecting journals and ledgers or testing a sample of transactions may detect such schemes, the use of computer assisted audit techniques can be effective in detecting potentially fraudulent transactions.

4.3 Procedures for Testing Completeness

- 4.3.1 The auditor's testing of journal entries and other adjustment can be effective only if the auditor is assured of access to all journal entries and other adjustments made during the audit period. Various procedures can be employed to confirm that the entire population of journal entries is considered. Among the procedures considered are the following:
 - Obtain an extract of all journal entries during the period as one of the first steps in the
 process of selecting and testing journal entries. This data set provides the foundation for
 conducting quantitative analytic procedures using CAAT tools, addressed in Section 4.5
 below.
 - If the entity is unable to provide an extract of all journal entries, auditors make additional inquiries of management to gain an understanding of reasons why the extract cannot be produced as a basis for planning and conducting alternative testing procedures:
 - "Roll forward" the data file or report of all journal entries from the company's
 accounting system to the period-end trial balance for each general ledger account to
 prove (or disprove) completeness. This audit technique helps to assess whether the
 complete population of journal entries has been accounted for in the general ledger
 and trial balance;
 - Reconcile the ending trial balance from the roll-forward with the financial statements
 to provide evidence that all journal entries, including top-side entries, have been
 considered by the auditor and are reflected in the financial statements.

Example: Roll-forward analysis can be performed with the aid of CAAT tools such as ACL™ by ACL Services, Ltd., IDEA Data Analysis Software by CaseWare IDEA, Inc., SAS from the SAS Institute, Inc., spreadsheet-based procedures (e.g., Microsoft Excel or ActiveData for Excel) or database systems such as Microsoft Access.

Example: Companies in industries such as banking have some accounts (e.g. loans, cash due to/from, and deposits) with high transaction volume which may make a roll-forward technique impractical. In these cases, the auditor considers performing other procedures such as reconciliations and confirmations at an interim date. Then roll-forward procedures can be performed using expected balances and when actual balances are outside of expectations additional procedures can be performed.

While obtaining the population of journal entries electronically may in many instances be the preferred method of ascertaining completeness when testing journal entries, it is also acceptable to use other manual auditing procedures for determining the completeness of the journal entry population.

- **Example:** One set of procedures for testing completeness is as follows:
- Reconcile significant systems-generated accounts to the general ledger and agree account balances for
 the system total and general ledger total to the system sub-ledger and general ledger, respectively, and
 test mathematical accuracy.
- Perform a test for the completeness of entries made after the first closing by accounting for all sequential numbers of entries.
- Perform reconciliations of the general ledger to the financial statements to detect other adjustments, such as top-side entries.
- Obtain the full general ledger detail of higher risk accounts affected by entries such as inter-company and related party transactions and agree the opening and ending balances to the financial statements; test the mathematical accuracy of the roll-forward of the balances.
- **4.3.2** For companies with complex organizations including multiple subsidiaries and diverse locations, journal entry testing for completeness, including the above-described roll-forward procedure may be performed at the subsidiary level, with consolidating and eliminating entries tested at the parent entity level.
- **Example:** In some cases, the auditor requests management to provide information (sometimes referred to as "business rules") that will aid the auditor in interpreting electronic data. The nature of the auditor's request for these rules may vary depending on the audit tests to be performed, but typically includes information (including hierarchies) explaining the company's:

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- Organizational structure,
- Sources of journal entries,
- Authorized journal entry preparers and approvers,
- Timing of the data extractions,
- Process for rolling up general ledger amounts into the financial statements.

Obtaining this information helps the auditor understand how IT affects the company's flow of transactions and the period-end financial reporting process. This includes understanding who in management participates in journal entry processing, the locations involved in the period-end financial reporting process, and the types of adjusting and consolidating entries.

4.4 Acquiring Electronic Data in a Cost-effective Manner

4.4.1 Due to the challenges of manually analyzing high volumes of journal entries and assessing the validity and completeness of these entries, it is often effective to obtain journal entry data electronically. In such cases, the auditor often requests the client's IT department as well as its financial managers to provide the required data. Analyzing electronic journal entry data may improve both the effectiveness and efficiency of an audit. Furthermore, audit effectiveness and efficiency may be improved if a company's financial management encourages the IT department to set up a regular process to extract, validate, and transfer requested journal entry data to the auditor using a standard format.

Example: A best practice is for the auditor to work with the company's financial managers to encourage their cooperation in providing electronic data to the auditor. Internal auditors, if applicable, are often effective in this role. The investment of time to establish a standard process and format for electronic journal entry data benefits both the company and the auditor.

4.4.2 Ideally, the company would establish a routine process to regularly (e.g., quarterly) provide the auditor with certain electronic information in a standard data structure. Table 2 is an example of some key data fields that may be extracted.

Table 2 - Journal Entry Data Fields

Journal Entry Identifier	Date/Time
Description	Period

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Source (Name) Effective date

Type (e.g., Manual, Reversing, Eliminating) Entry date/time

General Ledger Account Preparer ID

Number Prepared by

Name Approved by

Description Modified by

Amount Financial Statement Mapping

Debit/Credit Line number

Currency Line description

Business Unit

Name

4.5 CAAT Techniques for Assessing Completeness

- 4.5.1 In addition to the above-described steps (Section 4.3) for evaluating the population of journal entries, the auditor can assess completeness of the journal entry population through the use of certain CAAT procedures. For example, when the entity's accounting system is automated, the auditor can request that the company produce a report listing all entries to the general ledger throughout the relevant reporting period. This report can be produced in the form of a spreadsheet or database which will then allow segregating the population of entries into meaningful categories and rankings.
- **4.5.2** Sorting the population of journal entries using CAAT can reveal gaps and duplicate entries that might otherwise not be detected. Especially in cases where a company processes thousands (in some cases millions) of journal entries throughout the year, using CAAT can be particularly effective in detecting anomalies in the downloaded data. CAAT can provide an effective means for considering the entire population of journal entries and addressing fraudulent financial reporting risks.

5 Selection and Testing of Journal Entries and Other Adjustments

5.1 Using Professional Judgment

AU Section 316 requires the auditors to use professional judgment in determining the nature, timing, and extent of testing of journal entries and other adjustments. For purposes of identifying and selecting specific entries and other adjustments for testing, and determining the appropriate method of examining the underlying support for the items selected, the auditor should consider:

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- The auditor's assessment of the risks of material misstatement due to fraud.
- The effectiveness of controls that have been implemented over journal entries and other adjustments.
- The entity's financial reporting process and the nature of the evidence that can be examined.
- The characteristics of fraudulent entries or adjustments.
- The nature and complexity of the accounts.
- Journal entries or other adjustments processed outside the normal course of business.

5.2 Selecting Journal Entries for Testing

5.2.1 Familiarity with the company and industry. When selecting journal entries, it is important that the auditor have an understanding of the company's business operations as well as the industry in which it operates. Journal entries that appear to be appropriate in one setting may be inappropriate in another. It is only with an understanding of the company's environment that journal entries can be placed in context.

Example: It may be standard operating procedure for one company to post journal entries after hours whereas this practice in another company might raise suspicions. For this reason, it is beneficial if auditors with experience and familiarity with the company participate in planning and performing journal entry testing.

- **5.2.2** In determining which journal entries to select for testing, it is helpful to know how the financial statements can be misstated through fraudulent journal entries and adjustments. Fraudulent journal entries can be used in many different ways, such as:
 - Accounts payable can be understated by recording post-closing journal entries (i.e., writing off liabilities to income);
 - Adjustments to reserves and allowances can be understated or overstated;
 - Top-side adjustments can be made to improperly reduce liability accounts and increase revenue or decrease expenses;
 - Expenses can be reclassified to reserves and inter-company accounts, thereby increasing income;

¹⁶ AU § 316.61 (text from sub-paragraphs omitted)



- False sales can be reversed after year-end; out-of-period revenue can also be recorded to inflate revenue;
- Transactions can be recorded in un-reconciled accounts, e.g., cash, inter-company balances;
- Repair costs can be improperly capitalized as fixed assets.
- **5.2.3** In light of the variety of ways in which fraudulent entries can be recorded, many factors are considered in deciding how many and which journal entries to select for detailed testing, including:
 - Characteristics of the company, including:
 - The size of the company, the number of business units and locations, the number of different IT systems at the various locations;
 - Number of consolidations, number of related parties, business structure.
 - The nature and complexity of the entity's accounts.
 - The environment with respect to journal entries, including:
 - The sources of significant debits and credits;
 - The types of journal entries. Are they complex? Are there non-standard entries? Are there top-side entries relating to consolidations, segment reporting, currency translations?
 - The possibility that journal entries and other adjustments may be made outside of the general ledger.
 - When consolidated financial statements are involved, how the individual general ledgers are combined, accounts are grouped and elimination entries are recorded.
 - Identified risks of material misstatement due to fraud.
 - The effectiveness of controls that have been implemented over journal entries and other adjustments.
 - The entity's financial reporting process and the nature of the evidence that can be examined.

Among the characteristics of fraudulent entries or adjustments for which auditors are alert are the following:

• Made to unrelated, unusual or seldom-used accounts.



- Made by individuals who typically do not make journal entries, or made by blank or nonsensical user names, senior management or the IT staff.
- Recorded at the end of the period or as a post-closing entry that has little or no explanation or description.
- Made at unusual times of the day.
- That contain round numbers or a consistent ending number.
- That contain unusual combinations of debits and credits.
- Accounts containing transactions that are complex or unusual in nature.
- Accounts with significant estimates or period-end adjustments.
- Accounts that have been prone to error in the past.
- Accounts that have not been reconciled on a timely basis or contain unreconciled differences.
- Accounts with inter-company transactions.
- Are otherwise associated with an identified risk of material misstatement due to fraud.
- That are processed outside the normal course of business.

Example: Another procedure for selecting and testing journal entries by using a third-party data analysis software tool includes the following:

- Identify material journal entries that have an income statement impact
- Identify debits in typical credit accounts and credits in typical debit accounts
- Perform Benford's Law analysis on all transactions in the journal entry file ¹⁷
- Identify anomalies in the journal entry data such as entries posted:

¹⁷ Benford's Law is based on an observation first made by physicist Frank Benford in the 1920's that numbers with low first digits (i.e., 1, 2, 3) occurred more frequently in data sets than higher digits (i.e., 8, 9 and 10). From this observation he developed expected frequency distributions of digits that can be used to detect anomalies in large data sets. For example, his frequency distribution revealed the following: 1 - 30.1%; 2 - 17.6%; 3 - 12.5%; 4 - 9.7% and 5 - 7.9%. Auditors and forensic specialists may apply Benford's Law to financial data to discover deviations from normal distributions that may trigger the need to conduct further inquiry. Benford's Law analysis is a function included in the leading third-party data analysis tools to identify transactions that fall outside of the expected frequency distribution established by Benford's Law.

- By non-accounting personnel
- By senior management, including the controller and IT personnel
- On weekends or holidays
- At odd times of the day or on unusual days
- In whole dollar amounts or amounts ending in 999
- From unusual sources
- To accounts that are used infrequently
- With blank or little description
- With a long lapse of days between effective and posted dates or where the effective date is earlier than the posted date, which could be an indication of back dating
- **Example:** By downloading all journal entries into a CAAT program, the statistical characteristics of the population of entries can be readily determined. This can include such statistics as:
 - High, low, mean, median, and standard deviation of journal entry amounts, for both debits and credits and for standard and non-standard entries;
 - Stratification of the population into groupings based on amounts;
 - Trend analysis using graphs to visually depict the distribution of journal entries.

Some CAAT utilities for journal entry testing include the creation of graphs that present the volume and amounts of standard, non-standard, and all journal entries, volumes and amounts for those entries impacting the income statement, and volumes and amounts for those affecting the balance sheet.

5.2.4 Selecting journal entries of low-dollar value. Because of their impact on financial statements, it is customary for auditors to focus on high dollar value journal entries. These entries can have a significant impact on account balances reported in the financial statements.

However, some frauds are committed by processing a high volume of low-value entries. It is therefore important that the auditor assess the risk of fraud occurring in low-dollar value entries when planning journal entry testing.



5.3 Unpredictability in Journal Entry Testing

AU Section 316 requires that the auditor incorporate an element of unpredictability in the selection of auditing procedures performed from year to year. ¹⁸ The auditor can apply this requirement to testing of journal entries, by:

- Considering audit procedures completed during previous interim or year-end periods so that the current year's procedures can be varied
- Introducing unpredictability regarding the dollar amount and types of journal entries and other adjustments selected for testing
- Varying the timing of substantive journal entry testing
- Varying the locations or organizational units selected for testing
- Varying the extent of procedures applied based on the assessment of risk of material misstatement due to fraud
- Varying the dollar amount used to select journal entries may be especially important when applying
 unpredictability to the testing of journal entries. Selecting low-dollar value entries for testing can also
 introduce an element of unpredictability. Company personnel with the intent to perpetrate fraud may
 record entries just below testing thresholds knowing that the auditor is unlikely to make inquiries about
 such transactions. Thus, auditors' tests of journal entries that vary from period to period may improve
 the opportunity to detect fraudulent financial reporting.

5.4 Prioritizing Journal Entries for Testing

When faced with a high volume of journal entries to be considered for testing, auditors often use risk-based criteria to select entries for testing. While the dollar value of journal entries is one criterion used in the selection process, other criteria based on identified risks are also considered.

When selecting journal entries based on risk, auditors can use data analysis software, whether developed inhouse or provided by third-party software vendors (such as those identified earlier). These programs segregate journal entries by category of risk and then "weight" or "score" the entries based on risk assessments. These programs consider that a given journal entry may fall into multiple risk criteria (e.g., high-dollar-value entries recorded by the CFO on weekends) and assign a greater score to such entries, thereby increasing their likelihood for testing.

¹⁸ AU § 316.50

When selecting consolidating entries to test, there may not be a sufficient level of detail for the auditor to identify journal entries of interest. In these circumstances, auditors make further inquiries and examine additional evidence to determine which journal entries to test.

Example: Some automated journal entry testing procedures prioritize journal entries for testing based on the key characteristics of journal entries: who made the journal entry, what was entered, when the journal entry was entered, where the journal entry was entered, and why the journal entry was entered. ¹⁹ Sorting journal entries into these categories and assigning risk weightings within these categories may represent an effective approach to addressing the risks of material misstatement due to fraud.

5.5 Using CAAT for Journal Entry Testing

AU Section 316 indicates that when information technology is used in the financial reporting process, journal entries and other adjustments might exist only in electronic form. ²⁰ As noted above, extraction of electronic evidence may be carried out by the company's IT or internal audit personnel, provided to the company's financial managers for review, and then provided to the auditor. The auditor then employs computer-assisted audit techniques (CAAT) (for example, report writers, software or data extraction tools, or other systems-based techniques) to identify the journal entries and other adjustments to be tested.

A number of CAAT tools are available today for auditors conducting tests of journal entries and other adjustments. As mentioned above, these include familiar software tools such as Microsoft Excel® (including ActiveData for Excel) and Microsoft Access®. It also includes data analysis software tools designed explicitly for evaluating large sets of financial data. These tools include ACLTM and IDEA Data Analysis Software.

 $^{^{19}}$ See, for example, "A Risk-Based Approach to Journal Entry Testing – How software can help auditors detect fraud," by Richard B. Lanza and Scott Gilbert, Journal of Accountancy, July 2007.

Example: The following table is a menu of queries that can be performed by data analysis software to extract journal entry data:

Table 3 - CAAT Queries

Find journal entries that do not balance
Find gaps in journal entry number sequence
Find high-dollar journal entries
Find possible duplicate account entries
Find round-dollar journal entries
Show journal entry information by employee
Find all entries made by a specific employee
Show values for the 'journal entry type' code
Find manual entries
Sample journal entries (random or high dollar)
Find specific journal entries (by month, day or JE#)
Find all entries containing specific account(s)
Find all entries within a range of accounts
Find post-dated entries
Find entries with unusual (non-standard) descriptions
Find entries posted on weekends

The journal entries identified in these queries are then investigated to determine if they are appropriate and supported.

Example: Some CAAT programs used for journal entry testing provide for key word searching against the entire population of journal entries downloaded for testing. Auditors identify key words that might indicate a higher risk of fraud. Examples of such key words might include "CFO", "CEO", "adjust", "correct", "reverse", "fraud" (which might be explained by the reversal of an entry based on detection of a fraud) or a blank description.

5.6 Timing of Journal Entry Testing

AU Section 316.62 states that "[b]ecause fraudulent journal entries often are made at the end of a reporting period, the auditor's testing ordinarily should focus on the journal entries and other adjustments made at that time." Although many of these entries cannot be tested until after year-end, testing of other journal entries may be done throughout the year or in the early stages of year-end auditing. This may reveal control deficiencies or other anomalies that may affect the nature and extent of other audit procedures.

5.7 Evaluating Evidence from Journal Entry Testing

AU Section 316.68 contains a number of conditions that may be identified during field work that change or support a judgment regarding the identification and assessment of fraud risks. Examples of conditions listed in AU Section 316.68 that might be helpful for evaluating evidence from journal entry testing are missing documents, documents that appear to have been altered, and the denial of access to records, employees or others from whom audit evidence might be sought.

The auditor obtains and examines supporting documentation for journal entries to determine compliance with GAAP and the business purpose for recording entries.

Among the journal entries most susceptible to management override and fraud are those manual adjusting entries, including top-side journal entries that occur after the closing of a financial reporting period which may have little or no explanatory support. As a result, it is important that the auditor consider why such an entry was recorded, who prepared it, whether that individual was authorized to prepare it, when the entry was recorded, and the quality of the underlying evidence supporting the entry.

As mentioned above, it is important that the auditor exercise his or her professional skepticism when collecting evidence related to journal entry testing. This includes "... obtaining additional corroboration of management's explanations or representations concerning material matters such as through third-party confirmation, the use of a specialist, analytical procedures, examination of documentation from independent sources, or inquiries of others within or outside the entity."²¹

²¹ AU § 316.46

Example: During their year-end journal entry testing for a manufacturing company with significant volumes of raw material purchases and inventory, auditors encountered a significant debit entry to an accounts payable account. They discovered no supporting evidence for the journal entry in the file and received unsatisfactory responses to their inquiries. Ultimately, management conceded that it could not explain the entry and, as a result, the payable account was found to be significantly misstated.

After further investigation, the company determined that the controller was booking a large number of manual entries at each month-end. It was initially noted that several entries of large dollar amounts were improperly recorded as debits to the accounts payable account with credits to various accounts, including inventory variances. It also was observed that there were journal entries posted to other accounts that also lacked support and proper approvals. The auditors probed further into the journal entries and concluded that the nature and extent of these unsupported journal entries required the attention of a forensic specialist to investigate the entries. As a consequence of these actions, the fraud was uncovered and the company terminated the controller and commenced legal action against him because of his actions. The financial statements were restated.

Among other controls implemented, the company adopted the following internal controls to reduce the possibility of future irregular journal entries. Though many of these controls are fundamental internal controls, their implementation likely would have prevented the fraud.

- The controller's access to journal entry posting was eliminated;
- All manual journal entries would require detailed support and two signatures (one from the employee recording the entry and a second from the approving supervisor);
- All accounts reconciliations would require detailed support and two signatures (one from the employee performing the reconciliation and a second from the approving supervisor); and
- A corporate-level executive would perform a detailed review of the inventory variance accounts on a quarterly basis.

5.8 Staffing for Journal Entry Testing

Selection and testing of journal entries is most effective when performed by auditors with the appropriate skills and training. Familiarity with the company's business and the industry in which it operates is also important.

6 Documenting the Results of Procedures Performed

6.1 Requirements for Documenting Journal Entry Testing

PCAOB AS 3, *Audit Documentation*, established general requirements for documenting audits conducted under PCAOB standards. Among the requirements set forth in AS 3, paragraph 6 specifies that:

Audit documentation must contain sufficient information to enable an experienced auditor, having no previous connection with the engagement:

- a. To understand the nature, timing, extent, and results of the procedures performed, evidence obtained and conclusions reached, and
- b. To determine who performed the work and the date such work was completed as well as the person who reviewed the work and the date of such review.

These general requirements apply to documenting journal entry testing.

6.2 Documenting Results of Journal Entry Testing

Among other things, audit documentation is the written record of the auditing procedures performed, evidence obtained, and conclusions reached by the auditor. The nature and extent of documentation is based on a number of factors, including the nature of the procedures performed and the extent of judgment required in performing the work and evaluating the results.

The AICPA Practice Alert 2003-02, *Journal Entries and Other Adjustments*, ²² lists the following items to include in documenting journal entry testing:

- The procedures used by the engagement team to assess the completeness of the population of journal entries and other adjustments subject to review and testing.
- The journal entries and other adjustments that were selected for testing and the basis therefore.
- The procedures performed to audit the journal entries and other adjustments.
- The conclusions reached.
- Who performed and reviewed the work.

In addition, documentation of journal entry testing might also include:

- The procedures performed on supporting documentation associated with such entries.
- Evidence that the entry was properly authorized and approved.

²² AICPA Practice Alert 2003-02, Journal Entries and Other Adjustments, June 2003.



- Evidence that the entry was recorded to the appropriate account and period.
- Evidence that the entry was appropriate considering the nature/operations of the business.
- For entries outside the normal course of the company's business, the business rationale for such entries. ²³

²³ See AU § 316.67 for considerations concerning the business rationale of certain journal entries.