



## Report of the Vermont State Auditor

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December 28, 2006

# MEDICAID: AUDIT IDENTIFIES \$2.2 MILLION IN QUESTIONED PHARMACY CLAIMS

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**Randolph D. Brock**  
**Vermont State Auditor**  
**RPT. No. 06-04**

### **Mission Statement**

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**RANDOLPH D. BROCK**  
**STATE AUDITOR**



**STATE OF VERMONT**  
**OFFICE OF THE STATE AUDITOR**

December 28, 2006

Governor James Douglas  
Speaker of the House of Representatives Gaye Symington  
President Pro Tempore-elect of the Senate Peter Shumlin  
Secretary Cynthia D. LaWare, Agency of Human Services

Dear Colleagues:

The attached report, identifying approximately \$2.2 million in potential improper payments, is based on a number of computer analyses of Vermont Medicaid payments to pharmacy providers between January 1, 2004 and December 31, 2005.

**The report documents our belief that through aggressive data mining and recovery action on the part of the State, millions of dollars might be saved now and in the future.**

The data mining was performed under the direction of our Office by HWT, Inc., of Chicago, a firm with Medicaid claims review experience in 21 states. The analysis was based on proprietary algorithms of HWT, revised to fit applicable Vermont Medicaid policies and regulations, and applied to various categories of approximately 6 million paid pharmacy claims over the audit period submitted by approximately 220 in-state and out-of-state pharmacies. As a result of this analysis, we referred one pharmacy to the Medicaid Fraud & Residential Abuse division of the Attorney General's Office for potential criminal investigation, and additional referrals are possible.

I would like to state clearly that not all of the \$2.2 million highlighted will be collected, or "recouped," from providers. We have provided the Office of Vermont Health Access (OVHA) with an electronic file of our results and it is reviewing a large number of questionable claims to determine which ones may be legitimate payments based on rules or special conditions in effect at the time of payment.

Experience in similar cases involving the same algorithms in other states typically results in collection rates in the 50 to 70 percent range. Affected providers should be given the opportunity to submit documentation to support any questioned payments.

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Successful collection by the State of the typical percentage of identified questionable payments would result in a recovery in the range of \$1.2 million (see page 9 for summary). It is also important to note that Federal regulations require that, within 60 days of identifying improper payments, the State must reimburse the Centers for Medicare and Medicaid Services (CMS) for the approximately 60 percent of Federal share.

The results indicate to me that data mining of paid claims is a useful tool, in addition to other controls, to detect potential improper payments. Whether conducted internally, or through a contractor, it should be considered by management as a standard practice.

Throughout this effort, we relied on, and appreciate, the cooperation and professionalism of staff at the Office of Vermont Health Access, and staff at Electronic Data Systems Corporation (EDS) in Williston, the State's fiscal agent for the Medicaid program.

Sincerely,

A handwritten signature in black ink, appearing to read "Randolph D. Brock". The signature is stylized and cursive.

Randolph D. Brock  
Vermont State Auditor

cc: Michael Smith, Secretary of Administration  
James Reardon, Commissioner of Finance and Management

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## Abbreviations in this report

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AHS	Agency of Human Services
CMS	Centers for Medicare and Medicaid Services
EDS	Electronic Data Systems Corporation
GAGAS	Generally Accepted Government Auditing Standards
GAO	Government Accountability Office
MFRAU	Medicaid Fraud and Residential Abuse Unit
OVHA	Office of Vermont Health Access
PPPM	Per Participant Per Month
SAO	State Auditor's Office
SFY	State Fiscal Year
SURS	Surveillance and Utilization Review Sub-system
VHAP	Vermont Health Access Plan

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## Introduction

The State Auditor's Office (SAO) formally began an audit of the Medicaid Assistance Program on May 16, 2006. SAO has authority pursuant to 32 V.S.A. §163(11) to "perform, or contract with independent public accountants to perform, financial and compliance audits as required by the Federal Single Audit Act of 1984, 31 U.S.C. §7501 *et seq.*," which covers State agencies' use of Federal funds.

This report is part of a broader effort in which we are reviewing and assessing Medicaid's payment integrity controls and eligibility determinations, and identifying best practices.

As part of our assessment of payment integrity controls, we selected pharmacy payments as the first area of review. We expect to issue additional reports on other areas related to our Medicaid work.

The objective of this part of the overall review is to use data mining techniques to identify pharmacy claims that may not have been paid in accordance with Vermont Medicaid rules or standard practice guidelines.

Though Medicaid is a joint Federal/State program, states are responsible for ensuring proper payment and recovering misspent funds. The Agency of Human Services (AHS) is the Federally designated State Medicaid Agency. Within AHS, the Office of Vermont Health Access (OVHA) has been charged with the primary responsibility to detect improper payments and recover funds, especially through duties and staff assigned to the Surveillance and Utilization Review Subsystem (SURS) team. Federal regulations require the State to have in place methods for identifying, investigating and referring suspected fraud cases to law enforcement officials.

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# Highlights: Report of the Vermont State Auditor

## Medicaid: Audit Identifies \$2.2 Million in Questioned Pharmacy Claims

(December 28, 2006, Rpt. No. 06-04)

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### Why We Did This Audit

The Medicaid program has been designated a “High Risk” Program by the U.S. Government Accountability Office (GAO) due to its size, complexity, and a growing concern about inadequate fiscal oversight efforts to prevent inappropriate program spending. Vermont’s annual Medicaid program and administration expenditures are approximately \$1 billion and Medicaid is the largest programmatic area of State government.

Due to past audit findings by this Office and the accounting firm KPMG in audits of Federal Medicaid funds which cited weak post-payment review procedures, we decided to focus our efforts primarily on selected payment integrity controls and procedures.

Post-payment analysis of paid claims can be accomplished in part by a technique known as data mining. Data mining is a term applied to a variety of computer applications designed to extract and analyze specific data and patterns from large amounts of data. We selected a data mining contractor and worked with the firm to review paid pharmacy claims for potential improper payments.

### Findings

We identified about \$2.2 million in potential improper payments and have provided detailed information on all individual claims in question to the Office of Vermont Health Access (OVHA) for review.

The State Auditor’s Office contracted with a firm specializing in data mining to use specific algorithms to analyze pharmacy claims paid by Vermont Medicaid between January 1, 2004 and December 31, 2005.

After discussions with our contractor and OVHA we selected eight pharmacy algorithms which were likely to identify and quantify significant recoverable payments, based on results from other states.

In brief, these are the findings:

<i>Algorithm</i>	<i>Dollars identified</i>
A: Unreasonable quantities (non-tablets and capsules)	\$315,639
B: Unreasonable quantities (tablets and capsules)	1,131,831
C: Near duplicates, diff. providers	37,417
D: Near duplicates, same providers	364,021
D: Kit billing errors	49,212
E: Zithromax® errors	33,996
F: Lovenox® errors	109,823
G: Inhaler errors	158,260
<b><i>TOTAL:</i></b>	<b><i>\$2,200,199</i></b>

The identification of these \$2.2 million in potential overpayments is just the start of a process to recoup monies for the State.

First, OVHA may need to obtain additional data because we did not receive complete information on all of the pharmacy claims. In particular, not all claims had pricing information and, therefore, although potential problems with the claims could be identified, the



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### What We Recommend

We recommend in this report that OVHA take adequate steps to review and validate the specific claims identified here as potentially improper, and to seek collection from providers who received improper payments.

We recommend that OVHA consider additional data mining of pharmacy claims for the entire First Health contract period.

We also recommend that OVHA review this report with the current Medicaid Pharmacy Benefit manager to make sure controls today are adequate to prevent the type of potentially improper payments we identified.

potential overpayment amount could not be determined in these cases. In addition, pharmacy claims can include codes that provide explanations for unusual claims (e.g., the reason why a prescription was refilled early), which was not included in the data from EDS because it did not receive this data from First Health Services Corporation. According to a representative of the data mining contractor, this data would not have had a significant effect on the final results. In the representative's view, although experience differs state to state, the additional data would have likely reduced the overpayment estimate only slightly. Nonetheless, the additional data would provide useful information during the documentation review part of the recoupment process.

Second, pharmacies may have documentation (such as a prescription) that may justify some of the anomalous claims and should be allowed the opportunity to provide such explanations. The data mining contractor that we used estimates that, based on its experiences with other State Medicaid programs, about 60 to 70 percent of identified potential overpayments are likely to be collected except for potential overpayments due to unreasonable quantities, which generally have a collection rate of about 50 percent.

In addition, since Medicaid is partially Federally funded, of any amount collected, about 60 percent will have to be refunded to the Federal government. Accordingly, assuming a collection rate of 65 percent (50 percent for unreasonable quantity algorithms), the State can expect to recoup about \$1.2 million, of which about \$728,000 would have to be refunded to the Federal government.

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## Background

Medicaid was established as a result of amendments in 1965 that added Title XIX to the Social Security Act. It is a program that pays for medical services for individuals and families with low incomes and resources. Medicaid is the State's largest single program expenditure.

AHS is the single State Agency designated to administer or supervise the administration of the Medicaid program. Within the Agency, the Office of Vermont Health Access (OVHA) is charged with assisting beneficiaries in accessing clinically appropriate health services, as well as administering Vermont's various Medicaid programs efficiently and effectively.

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### Vermont's Medicaid Pharmacy Program

In SFY 2005 the State provided pharmaceutical coverage to approximately 150,000 beneficiaries, and today pays some or all of the health care costs for 25 percent of Vermont's population. The primary Medicaid program is the so-called Traditional Medicaid which provides comprehensive coverage to the low income population that is aged, blind or disabled, and to families with dependent children.

Other pharmacy programs include:

- The Vermont Health Access Plan (VHAP) Uninsured
- VHAP Pharmacy
- VScript and VScript Expanded, and
- Healthy Vermonters Program

Additional information about programs, covered services and eligibility can be accessed at: <http://www.ovha.state.vt.us/ProgramsHome.cfm>

According to OVHA, pharmacy spending is one of the top cost category in Vermont's publicly funded health programs. According to AHS, Medicaid pharmacy spending for SFY 2006 represented approximately 11.5 percent of total Medicaid spending or about \$108.5 million out of a total of \$940.8

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million in Medicaid program expenditures.<sup>1</sup> See appendix I for a breakdown of Medicaid expenditures for State Fiscal Years 2001 to 2005. In addition, appendix II provides data on frequently prescribed drugs, by paid amounts.

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## Pharmacy claims processing

The Vermont Medicaid program manages pharmacy claims processing differently than for other claims processing, e.g., hospital inpatient, nursing home, and physician claims.

Medicaid pharmacy claims are processed or “adjudicated” by a third-party pharmacy benefits manager before being transferred to Vermont’s Medicaid fiscal agent for payment to pharmacies.

The State of Vermont entered into a contract with the First Health Services Corporation of Glen Allen, Virginia in July, 2001 to process Vermont’s pharmacy claims. As the State’s pharmacy benefits manager for Medicaid, the company was to provide a broad range of services that would help Vermont enhance the quality of care, control pharmacy costs, and reduce State administrative costs.

First Health was obligated to maintain and support a variety of systems to verify beneficiary eligibility prior to pricing claims, and to process and price claims in compliance with numerous State and Federal regulations, and contract provisions.

One required system was an interface with Electronic Data Systems Corporation (EDS), the State’s fiscal agent, to transfer paid and denied claims transaction information to EDS on a daily basis. This would allow EDS to pay claims on a weekly basis and to collect data necessary for Federal and State reports.

The State Medicaid fiscal agent, EDS, provided our data mining contractor, HWT, Inc., of Chicago and Portland, Maine, with a database file of 6,092,051 pharmacy claims paid by Vermont Medicaid between January 1, 2004 and December 31, 2005.

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<sup>1</sup>We did not audit this figure. Our audit of the state’s consolidated basic financial statements for the period ending June 30, 2006 is ongoing and is expected to be completed shortly.

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## Scope & Methodology

We reviewed Medicaid paid pharmacy claims and existing rules and regulations for the period of January 1, 2004 to December 31, 2005. There were approximately six million claims totaling about \$275 million in paid amounts under review.

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## Algorithms

An “algorithm” is a mathematical and computing term which means a set of specific steps, procedures, or calculations to address a question or problem. In simplest terms, an algorithm could be considered a recipe, or a list of procedures.

To develop these algorithms, the data mining contractor combined expertise in pharmacy issues, databases and “data dictionaries” which define data fields, statistical and computing knowledge and experience, and local payment rules that might apply.

Therefore, before running the algorithms against the paid claims data, the State Auditor’s Office, HWT, and OVHA worked together to identify Vermont’s provider reimbursement policies and billing instructions that apply to pharmacy payments, a critical step. In addition, some of the algorithms utilize national standards, such as pharmacy billing guidelines from the National Council for Prescription Drug Programs (NCPDP).

Once the data from EDS was received and validated, and OVHA provided guidance on payment policies, HWT finalized its algorithms and began to analyze Vermont’s paid pharmacy claims.

Potential provider overpayment amounts are calculated uniquely for each algorithm, based on the data being examined and Vermont Medicaid rules and standards. Details of the specific overpayment calculation formulas were included with the results provided to OVHA.

HWT performed validation tests on the preliminary data results, reviewed findings with its medical director, and issued draft data result sets to the State Auditor’s Office for further evaluation. Algorithms were then re-run, revised, or results recalculated as necessary based on these reviews before the draft report was provided to OVHA and AHS.

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## Government Audit Standards

We conducted this audit from May to November, 2006 in accordance with Generally Accepted Government Auditing Standards, issued by the Comptroller General of the United States.

Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence that provides a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

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## Results of Data Mining

The data mining of paid pharmacy claims, according to the algorithms chosen, identified a total of \$2,200,199 in possible improper payments, pending review by the State Medicaid program.

Improper payments are any payments that should not have been made or that were made in an incorrect amount under statutory, contractual, administrative, or other legally applicable requirement. Improper payments also include duplicate payments, payments for services not received or not covered, and payments that do not account for credit for applicable discounts.

When working with other state Medicaid programs, HWT, Inc., the data mining company that we used, typically is also responsible for following up on the identified potential overpayment claims and seeking reimbursement on behalf of the state, when appropriate. According to HWT, about 60 to 70 percent of identified potential overpayments are likely to be collected except for potential overpayments due to unreasonable quantities, which generally have a collection rate of about 50 percent. Once it is validated that a payment was improper, Federal regulations require that, within 60 days of identifying

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improper payments, the State must reimburse the Centers for Medicare and Medicaid Services for the approximately 60 percent of Federal share.<sup>2</sup>

Thus, the estimates for maximum potential dollar recovery are:

For Federal government	\$727,806
For State government	\$485,204

Table 1 provides a breakdown of what was found and the estimated recovery that is likely for each of the algorithms that were run. Appendix III provides additional descriptions of each algorithm.

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<sup>2</sup>According to 42 CFR 433.316, the date in which an overpayment is discovered is the beginning date of the 60-day calendar day period. In cases in which the overpayment is not as a result of fraud and abuse, the date is the earliest of the date on which (1) the state notifies a provider in writing of an overpayment and specifies a dollar amount, (2) a provider initially acknowledges a specific overpaid amount in writing, and (3) the state, or fiscal agent of the state, initiates a formal action to recoup a specific amount without first having notified the provider in writing. In the case of overpayments that result from fraud and abuse, the date of the overpayment is the date of the final written notice of the state's overpayment determination.

**Table 1: Results of Pharmacy Algorithms and Potential Fund Recovery**

No.	Pharmacy Algorithms	Dollars identified	Estimated recovery @ 50/65 percent collection*	60 percent Federal share of recovery	40 percent State of Vermont share
1	Unreasonable Quantity*	\$315,639	\$157,820	\$94,692	\$63,128
2	Unreasonable Quantity (tablets and capsules only)*	\$1,131,831	\$565,916	\$339,550	\$226,366
3	Near Duplicates of Different Providers	\$37,417	\$24,321	\$14,593	\$9,728
4	Near Duplicates of Same Providers	\$364,021	\$236,614	\$141,968	\$94,646
5	Kit Billing Errors	\$49,212	\$31,988	\$19,193	\$12,795
6	Zithromax® Errors	\$33,996	\$22,097	\$13,258	\$8,839
7	Lovenox® Errors	\$109,823	\$71,385	\$42,831	\$28,554
8	Inhaler Errors	\$158,260	\$102,869	\$61,721	\$41,148
	<b>Totals**</b>	<b>\$2,200,199</b>	<b>\$1,213,010</b>	<b>\$727,806</b>	<b>\$485,204</b>

\*Recovery estimate is set at 50 percent for algorithms No. 1 and No. 2 in this chart because the experience of the data mining contractor indicates a higher number of claims identified as potential overpayments for these algorithms are ultimately found to be valid.

\*\*Amounts may not add due to rounding.

Source: *HWT, based on analysis of Vermont Medicaid pharmacy claims paid between January 1, 2004 and December 31, 2005, which was provided by EDS.*

The potential improper payments identified can be the result of a variety of dispensing, billing or processing errors. For example, in some of the claims that were identified as possible overpayments for the inhaler algorithm, it appears that the pharmacy entered the number of puffs or actuations

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contained in the inhaler as the quantity billed instead of the actual quantity dispensed.

The identified potential overpayments may also indicate possible fraud concerns, such as a case in which a provider might submit a claim for a prescription that was not picked up by a beneficiary, or in which a provider dispensed two 15-day prescriptions (claiming two dispensing fees) instead of dispensing a single 30-day prescription with only one dispensing fee.

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### Action Needed for Actual Recovery of Overpayments to Occur

The initial identification of potential improper payments is just the beginning of the recoupment process.

First, additional data may need to be retrieved from the prior pharmacy benefit manager, First Health Services Corporation. Specifically, not all claims had pricing information and, therefore, although potential problems with the claims could be identified, the potential overpayment amount could not be determined in these cases. In addition, pharmacy claims can include codes that provide explanations for unusual claims (e.g., the reason why a prescription was refilled early), which was not included in the data from EDS because it did not receive this data from First Health Services. Such additional data would provide useful information during the documentation review part of the recoupment process.

Second, providers should be given the opportunity to provide an explanation and/or documentation supporting the potentially invalid claims. For example, a claim identified under the unreasonable quantity algorithms would not be recouped if the pharmacy had documentation, such as a prescription, and a signature log that supported the amount billed. Once these actions are taken and the potential overpayment amount validated, the State can seek reimbursement for the claim. If OVHA determines that a provider may have been submitting improper claims intentionally, OVHA may also need to refer such cases to the Vermont Medicaid Fraud and Residential Abuse Unit (MFRAU) for further investigation.

We believe that it is critical that the OVHA take these next steps in order to recover amounts that should not have been paid. Moreover, such a recovery process could deter future fraudulent practices and/or cause pharmacies to be more careful when entering claims.



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## Additional Data Mining Could Find Significantly More Savings

The use of additional data mining could result in significant savings in the Medicaid program. For example, since our review only covered eight algorithms in the pharmacy area, the use of additional algorithms could identify more potential overpayments through analyses of other factors (such as drug-specific analyses other than the two that were part of this review). In addition, we analyzed claims from the final 24 months of the period the State contracted with First Health Services Corporation for claims processing. We did not review claims from the first 26 months of this contract, November 2001<sup>3</sup> to December 2003. If the same eight algorithms are employed to analyze claims from this initial 30-month contract period, we believe the results could identify significant additional dollars in potential improper payments which could increase recoveries to the State.

Another factor to consider in any future data mining action is that it can be used to identify control weaknesses and prevent improper payments in the future. The scope of our review did not include the current pharmacy benefit manager, MedMetrics Health Partners, so we do not know whether the system used by this contractor would have identified problems with the claims that we are questioning. Needless to say, it is better to catch problems before claims are paid (i.e., through preventive controls), rather than seek to rectify a problem once the funds have been dispersed.

Accordingly, it would be prudent for OVHA to assess the extent to which MedMetrics has controls in place to catch the types of anomalies identified by our data mining analysis. This could be accomplished by reviewing the controls that this contractor has put in place and/or by running the same type of data mining algorithms that were part of our review against claims that have been approved by MedMetrics to determine the extent to which the system used by this contractor would prevent such improper claims.

If the current system being used does not have the controls in place to prevent the types of potential improper payments that we identified, we would expect to see future potential improper payments like the \$2.2 million we have already identified. Moreover, expanding the use of data mining to other algorithms using the claims approved by MedMetrics could also find further potential savings while having the added benefit of possibly identifying

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<sup>3</sup>OVHA's contract with First Health Services Corporation was effective July 1, 2001, but the company did not begin processing claims until November 2001.

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control weaknesses that could be plugged and result in an overall reduction in improper payments in the future.

We believe that through aggressive data mining and recovery action on the part of OVHA, millions of dollars might be saved now and in the future.

This is critical not only because it makes sound fiscal sense but also because of Vermont's new agreement with the Federal government regarding the Federal payment of Medicaid claims. Specifically, the Global Commitment to Health Demonstration Waiver Program agreement with the Federal government caps Federal Medicaid funding for selected Medicaid expenditures between Oct. 1, 2005 and September 30, 2010. The agreement notes, "The cap places the State at risk for enrollment and for Per Participant Per Month (PPPM) cost trends." Accordingly, even more than before, it is essential that the State pay only justified and documented claims.

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## Payment Error Rate Requires More Research

CMS last year issued guidelines for states to begin planning for annual reports of State-specific payment error rates in the Medicaid program in the coming years.

State data on payment error rates will help CMS comply with the *Improper Payments Information Act of 2002*. This law requires heads of Federal agencies to annually report to the Congress the estimates of improper payments for the programs they oversee, and to report on actions taken to reduce erroneous payments. Preventing improper payments typically is significantly more cost-effective than attempting to identify them retrospectively and then recoup funds from providers.

A comprehensive payment error study typically involves review of a large number of randomly selected claims, including a review of the eligibility of the beneficiary, medical necessity of the provided service, and a review of documentation by the providers justifying the claims submitted. Some studies also employ telephone surveys of recipients to help identify any services that may have been billed, but not actually provided.

The Vermont Medicaid program is in the planning stages for determining how it will comply with CMS guidelines to measure payment error rates in the Medicaid program.

Due to the narrow focus and limited number of algorithms employed for this report, it is not possible to estimate or project an overall payment error rate in Medicaid pharmacy expenditures. However, an analysis of targeted, drug-

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specific algorithms may be instructive as it reveals wide-ranging error rates for drug-specific algorithms.

For example, we estimate the potential error rate on inhaler and nasal spray claims to be 0.7 percent, or \$158,260 in potential errors against \$23.3 million in inhaler and nasal spray expenditures; for prescribed drug kits, we estimate a potential error rate of 1.3 percent, or \$49,212 in potential errors against \$3.8 million in expenditures. Similarly, potential Zithromax errors of \$33,996 over a two-year period would represent a payment error rate of 2.0 percent against Zithromax expenditures of approximately \$1.6 million. The potential error rate for Lovenox prescriptions over the audit period was 12.2 percent, or \$109,823 in potential errors against expenditures of \$902,150.

Further analysis would be needed to estimate a payment error rate for the entire Medicaid pharmacy area with the required degree of confidence. For example, CMS has suggested that states conduct medical, data processing, and eligibility reviews on a monthly random selection of a total of approximately 800 to 1,200 fee-for-service claims to develop a state-specific payment error rate.

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## Conclusions

By employing data mining algorithms to analyze two years of paid Medicaid pharmacy claims, we identified approximately \$2.2 million in potential improper payments. These improper payments can be the result of a variety of dispensing, billing or processing errors, or may indicate potential fraud, which should be investigated in more detail.

Data mining appears to be a useful tool to identify pharmacy claims which may be submitted or paid in violation of professional standards, or State and Federal laws, rules or regulations.

Data mining is one of many post-payment audit tools, but it has the advantage of using an “all claims” approach through computer analysis of a large database of paid claims, rather than a traditional “audit sample” approach which reviews a much smaller number of claims.

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## Recommendations

1. OVHA should systematically review and validate the specific claims identified by data mining to clearly determine which of the claims were incorrectly billed or paid. OVHA should seek refunds for those identified claims that were improperly paid and for which providers are unable to document as valid claims. Pharmacies should have the opportunity to provide documentation which supports the questioned paid claims as valid.
2. OVHA should extend the analysis of past claims, using some or all of the algorithms employed in this report, to the earlier portion of the First Health pharmacy benefit management contract, that is, from November 2001 through December, 2003. We believe such a review could identify significant additional questionable payments depending on Vermont Medicaid's policies and procedures in place during this period.
3. OVHA should consider employing additional data mining analysis, using different algorithms than the eight we employed, to check for other improper payments in the entire First Health contract period of July 2001 through December, 2005.
4. OVHA, in conjunction with its new Medicaid pharmacy benefit manager, MedMetrics Health Partners of Worcester, MA, should ensure that software controls are in place to automatically identify and prevent payment of the most common billing errors this report has identified and which are confirmed as improper payments by OVHA. Such controls, if working, would prevent disbursement of significant dollars annually in potentially improper payments.
5. OVHA and MedMetrics Health Partners should review the data related to specific pharmacies in the data results that we provided to them to determine if on-site pharmacy audits are warranted for those establishments identified as exhibiting higher-than-expected error rates or other patterns suggestive of fraud or abuse. OVHA should also consider reviewing this data with the State's Medicaid Fraud and Residential Abuse Unit (MFRAU) to determine if specific investigations are warranted.
6. OVHA should employ data mining of pharmacy claims as an ongoing tool for post-payment review.

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## Agency Comments and Our Evaluation

On December 19, 2006, the Director of OVHA provided a written response to this report on behalf of AHS and OVHA, which is reprinted in appendix IV. In his written response, the Director did not explicitly address each of our recommendations, however, he described specific actions that OVHA planned to take in response to this report. First, the Director stated that in January 2007 OHVA plans to initiate a request for proposals and obtain bids to use one or more vendors to identify overpayments in pharmacy and other types of claims. Second, the Director stated that OVHA has secured assurances from its prior pharmacy benefit manager to obtain a complete pharmacy claims file in January 2007 that will be used to explore the potential improper payments that we have identified. Third, the Director stated that OVHA is retooling its program data and surveillance and utilization review activities into a Program Integrity unit that would use prospective, concurrent, and retrospective analysis of utilization patterns to fully identify suspected waste, underuse, overuse, misuse, and abuse. Lastly, the Director stated that OVHA's Pharmacy and Program Integrity Units will be working with the current pharmacy benefits manager, MedMetrics, to assure that appropriate safeguards are in effect to contain errors and overpayments.

It appears that these initiatives, when successfully executed, should largely address the issues that we have identified. However, it was unclear whether these initiatives will address each of our recommendations. For example, the Director's response did not include the timeframes of the claims that the expected data mining contractor would be reviewing. Accordingly, we cannot determine whether our recommendation related to extending the analysis of past claims, using some or all of the algorithms employed in this report, to the earlier portion of the First Health pharmacy benefit management contract, will be implemented as part of this initiative.

The Director also provided comments related to specific wording in the report, which is summarized below along with our evaluation, as appropriate.

- OVHA requested that we clarify the wording in specific areas of the report related to the expected collection rate. When appropriate, we clarified the report to reflect the data mining contractor's experience that about 60 to 70 percent of identified potential overpayments are likely to be collected except for potential overpayments due to unreasonable quantities, which generally have a collection rate of about 50 percent.

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- OVHA’s response reiterated the data limitations that we encountered in this review because certain data were not available from the prior pharmacy benefit manager. The Director stated that the missing data would modify the contractor’s findings and suggested that we add wording to the report stating that the estimated collection rate applies when all claims data elements are available, which was not the case for the Vermont data. We believe that OVHA’s response overstates the likely affect of the missing data. First, some of the claims identified as having potential improper payments were missing pricing information and, therefore, the potential overpayment amount was understated in these cases. Second, according to a representative of the data mining contractor, the data from First Health Services Corporation that was not available to include as part of the data mining analysis would not have had a significant effect on the final results. In the representative's estimation, although experience differs state to state, the additional data would have likely reduced the overpayment estimate only slightly. Nonetheless, the representative believed that the additional data will provide useful information during the documentation review part of the recoupment process.
  - The Director also provided technical comments and requested clarifying language, which we addressed in the report, as appropriate.

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In accordance with 32 V.S.A. §163, we are also providing copies of this report to the Secretary of Administration, the Commissioner of Finance and Management, and the State Library. In addition, the report will be made available at no charge on the State Auditor’s web site, [www.state.vt.us/sao](http://www.state.vt.us/sao).

Any questions or comments about this report can be directed to the State Auditor’s Office at 828-2281 or via e-mail at [auditor@sao.state.vt.us](mailto:auditor@sao.state.vt.us). George Thabault was the primary auditor of this examination, with the assistance of Linda Lambert, CPA, CISA.

# Appendix I

## Vermont Medical Assistance Program Expenditure History

### Vermont Medical Assistance Program History as Reported on CMS Form 64

<u>CATEGORY OF SERVICE</u>	<u>SFY01</u>	<u>SFY02</u>	<u>SFY03</u>	<u>SFY04</u>	<u>SFY05</u>
HOSPITAL INPATIENT	61,235,605	65,925,694	70,815,722	83,998,647	93,134,418
VERMONT STATE HOSPITAL	245,652	636,151	228,087	76,209	174,781
NURSING HOMES	80,508,083	90,552,604	94,577,138	101,336,043	105,313,728
INTERMEDIATE CARE FACILITY FOR MENTALLY RETARDED	1,515,153	1,768,523	1,626,624	1,093,091	690,151
PHYSICIANS	39,750,085	42,751,245	45,817,421	49,602,098	61,939,053
OUTPATIENT	36,537,021	39,548,198	42,548,476	47,403,618	52,912,134
<b>DRUGS / PHARMACY</b>	<b>81,216,599</b>	<b>87,417,341</b>	<b>94,125,511</b>	<b>115,519,050</b>	<b>136,917,816*</b>
MENTAL HEALTH CLINIC SERVICES	3,247,654	1,520,806	1,933,475	3,641,692	2,448,006
LAB & RADIOLOGY	890,074	1,715,732	2,008,831	1,943,578	3,372,163
HOME HEALTH	6,124,961	6,941,838	5,599,250	5,902,849	7,483,258
RURAL HEALTH	4,130,272	4,996,085	4,659,949	5,323,502	5,172,132
MANAGED CARE CAPITATION PYMTS, CRT off FY00)	34,554,863	36,013,569	38,136,484	18,539,735	34,149,945
BUY-IN	8,843,830	9,801,774	10,716,299	11,638,397	14,165,663
MENTAL HEALTH WAIVER	5,193,050	5,005,017	4,293,507	4,030,715	4,411,637
DEVELOPMENTAL SERVICES WAIVER	67,871,189	74,874,214	77,643,067	83,098,592	92,867,637
HOME CARE WAIVER	13,493,438	19,317,506	23,260,998	27,031,858	31,471,109
TRAUMATIC BRAIN INJURY WAIVER	2,124,564	2,059,814	2,205,963	2,400,295	2,633,223
ENHANCED RESIDENTIAL CARE WAIVER	1,219,894	1,770,393	2,156,820	2,391,180	2,711,956
TARGETED CASE MGMT. (DEPT. FOR CHILDREN & FAMILIES & DEPT. OF DEVELOPMENTAL AND MENTAL HEALTH SERVICES)	13,096,197	13,808,363	14,125,171	14,167,632	15,339,020
PERSONAL CARE SVCS	4,218,845	5,678,443	8,013,204	10,476,720	13,059,169
PRIMARY CARE CASE MGMT	3,777,440	7,667,766	7,881,456	4,905,117	4,950,545
ASSISTIVE COMMUNITY CARE SVCS	2,767,793	4,455,992	5,213,192	6,477,940	
OTHER CARE - OVHA	35,437,716	39,849,152	44,038,494	63,838,484	66,703,834
OTHER CARE - MENTAL HEALTH	20,136,883	25,024,013	32,013,020	37,691,801	37,349,447
OTHER CARE - HEALTH DEPT.	4,850,151	8,167,624	10,181,559	11,320,758	10,783,378
OTHER CARE - DEPT. FOR CHILDREN & FAMILIES	10,687,223	12,936,289	14,655,550	14,591,479	19,864,804

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## Appendix I

### Vermont Medical Assistance Program Expenditure History

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OTHER CARE – DEPT OF AGING & INDEPENDENT LIVING	551,437	1,022,805	2,235,614	2,596,031	2,623,296
OTHER CARE - EDUCATION	33,716,620	38,695,038	34,558,319	31,454,470	38,723,332
3 <sup>RD</sup> PARTY LIABILITY / Overpayments / Premiums	(3,662,820)	(4,320,021)	(4,866,550)	(8,681,387)	(12,201,443)
<b>TOTAL PROGRAM</b>	<b><u>574,279,472</u></b>	<b><u>645,601,968</u></b>	<b><u>690,402,651</u></b>	<b><u>753,810,194</u></b>	<b><u>849,164,192</u></b>
<b>ADMINISTRATION</b>	<b><u>44,523,043</u></b>	<b><u>51,760,309</u></b>	<b><u>61,942,138</u></b>	<b><u>66,242,833</u></b>	<b><u>61,959,399</u></b>
<b>MEDICAID GRAND TOTAL</b>	<b><u>618,802,515</u></b>	<b><u>697,362,277</u></b>	<b><u>752,344,789</u></b>	<b><u>820,053,027</u></b>	<b><u>911,123,591</u></b>
<i>percent change from previous year</i>	<u>9 percent</u>	<u>13 percent</u>	<u>8 percent</u>	<u>9 percent</u>	<u>11 percent</u>

Source: AHS.

\* Note: Medicare Part D prescription coverage took effect in SFY 06 beginning Jan. 1, 2006. Full implementation was delayed until March. As a result of Medicaid-eligible seniors moving their pharmaceutical coverage to Medicare Part D, the SFY 06 Medicaid expenditures for pharmacy dropped to \$108.5 million, according to AHS.



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## Appendix II

### Frequently prescribed drugs in Vermont Medicaid program, by paid amounts for SFY 2005 and SFY 2006

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#### Frequently Prescribed Drugs -- Vermont Medicaid

DRUG (VARIOUS DOSES)	PAID AMOUNTS (SFY 05)	PAID AMOUNTS (SFY 06)
ZOCOR®	8,496,430	7,271,128
ZYPREXA®	5,636,548	3,969,081
SEROQUEL®	5,504,259	5,394,908
RISPERDAL®	5,008,032	4,682,198
NEXIUM®	4,162,889	5,757,461
PREVACID®	3,675,160	4,235,239
ADVAIR DISKUS®	3,455,847	3,627,710
PROTONIX®	3,228,464	1,259,918
LEXAPRO®	3,105,068	2,930,380
ZOLOFT®	3,040,668	2,500,622
ABILIFY®	2,946,810	3,455,669
EFFEXOR®	2,804,769	2,507,826
SUBOXONE®	2,280,296	1,924,675
LIPITOR®	2,248,817	1,909,191
TOPAMAX®	2,217,632	2,346,686
LANTUS®	2,077,802	1,168,832
CELEBREX®	2,068,555	1,327,725
LAMICTAL®	2,038,592	1,985,802
PLAVIX®	1,964,530	1,700,384
AMBIEN®	1,523,328	1,279,275

Source: OVHA

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## Appendix III

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### Technical Description of Algorithms

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HWT developed the following algorithms based on (1) its work with a variety of state Medicaid agencies, (2) its subject matter expertise regarding national and drug-specific standards and guidelines, such as the National Drug Code (NDC) Directory<sup>1</sup> and the National Council for Prescription Drug Programs standards,<sup>2</sup> (3) reviews of Vermont's Medicaid policies and rules, and (4) discussions with the SAO and OVHA staff.

In each case, the initial algorithm was run and adjusted, as necessary, to (1) remove claims that were determined by the HWT Medical Director as likely to be valid and (2) address anomalies identified by HWT, SAO, and/or OVHA staff. For example, the HWT Medical Director removed a claim from the results set of the Unreasonable Quantity (excludes tablets and capsules) algorithm even though it met the criteria set by the algorithm because the applicable drug in this claim is applied topically and is subject to large variation due to the body surface area affected.

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#### Algorithm No. 1: Unreasonable Quantities (excludes tablets and capsules)

**\$315,639 in potential improper payments identified.**

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##### Purpose

To identify claims for drugs that were not dispensed in tablet or capsule form, which were billed in quantities that far exceed normal or maximum dosage standards.

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##### Description

The algorithm identifies claims for non-tablet and non-capsule drugs where a claim for a particular drug was more than 3 times greater than the average Vermont Medicaid claim for the applicable drug for:

- quantity dispensed,

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<sup>1</sup>Registered drug establishments are required to provide the U.S. Food and Drug Administration with a list of all prescription drugs and insulin products that have been manufactured, prepared, propagated, compounded, or processed for commercial distribution. The NDC directory contains a variety of information about the product, including dosage form, strength, and package size and type.

<sup>2</sup>The National Council for Prescription Drug Programs, Inc. creates and promotes standards for the transfer of data to and from the pharmacy services sector of the healthcare industry.

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## Appendix III

### Technical Description of Algorithms

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- reimbursement amount, and
- quantity per days supplied.

The potential improper payment amount is derived by taking the actual amount paid, adjusted for other insurance and the dispensing fee, and subtracting what the claim amount should have been (i.e., multiplying the correct quantity by the lowest price).

Example of a potentially improperly paid claim:

<b>Drug</b>	Androderm® 5 MG/24 hour patch <sup>3</sup>
<b>Quantity dispensed</b>	150
<b>Days supplied</b>	30 days
<b>Amount paid</b>	\$884.19
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$5.59

In this case, HWT determined that the correct quantity should have been 30 patches, not the 150 that were billed and paid. Accordingly, the potential overpayment of this claim is:

$$[\$884.19 - \$4.25] - [30 \times \$5.59] = \$712.24$$

According to HWT, it recoups a smaller percentage of potential overpayments for this algorithm relative to other pharmacy algorithms (generally about 50 percent). A claim identified under this algorithm would not be recouped if the pharmacy's documentation includes a prescription for the amount billed and signature log.

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### Data Limitations

In some cases, HWT was unable to calculate potential overpayments because the data provided did not contain the pricing elements needed for the

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<sup>3</sup>Androderm® is a transdermal delivery system that delivers consistent, controlled concentrations of testosterone through a once-daily applied skin patch.

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## Appendix III

### Technical Description of Algorithms

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calculations. Although these claims were included in the data provided to OVHA, they are not included in the estimated overpayment amount contained in this report.

In addition, recipient co-payments were not included in the data provided to HWT so such payments were not factored into the analysis.

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#### Algorithm No. 2: Unreasonable Quantities, Tablets and Capsules

**\$1,131,831 in potential improper payments identified.**

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##### Purpose

To identify claims for drugs that were dispensed in tablet or capsule form, which were billed in quantities that far exceed normal or maximum dosage standards.

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##### Description

The algorithm identifies claims for tablet and capsule drugs where a claim for a particular drug was more than 3 times greater than the average Vermont Medicaid claim for the applicable drug for:

- quantity dispensed,
- reimbursement amount, and
- quantity per days supplied.

The potential improper payment amount is derived by taking the actual amount paid, adjusted for other insurance and the dispensing fee, and subtracting what the claim amount should have been (i.e., multiplying the correct quantity by the lowest price).

Example of a potentially improperly paid claim:

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## Appendix III

### Technical Description of Algorithms

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<b>Drug</b>	OxyContin®, <sup>4</sup> 80 MG tablet
<b>Quantity dispensed</b>	960
<b>Days supplied</b>	30 days
<b>Amount paid</b>	\$8,808.66
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$8.65

In this case, HWT determined that the correct quantity should have been 60 tablets, not the 960 that were billed and paid. Accordingly, the potential overpayment of this claim is:

$$[\$8,808.66 - \$4.25] - [60 \times \$8.65] = \$8,285.41$$

According to HWT, it recoups a smaller percentage of potential overpayments for this algorithm relative to other pharmacy algorithms (generally about 50 percent). A claim identified under this algorithm would not be recouped if the pharmacy's documentation includes a prescription for the amount billed and signature log.

---

### Data Limitations

In some cases, HWT was unable to calculate potential overpayments because the data provided did not contain the pricing elements needed for the calculations. Although these claims were included in the data provided to OVHA, they are not included in the estimated overpayment amount contained in this report.

In addition, recipient co-payments were not included in the data provided to HWT, so such payments were not factored into the analysis.

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<sup>4</sup>OxyContin® contains oxycodone, a narcotic pain reliever intended to help relieve pain that is moderate to severe in intensity. According to the U.S. Food and Drug Administration, OxyContin® is designed so that the oxycodone is slowly released over time, allowing it to be used twice daily.

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## Appendix III

### Technical Description of Algorithms

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#### Algorithm No. 3: Near Duplicate Claims, Different Providers

**\$37,417 in potential improper payments identified.**

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##### Purpose

To identify two or more claims, filed by different providers, that appear to be duplicates.

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##### Description

The First Health Services Pharmacy Provider Manual for Vermont Medicaid states that pharmacies should not dispense refills until 75 percent of the original days' supply has been utilized. This algorithm identifies claims that were billed through two or more different pharmacy providers within a 5-day period for the same recipient, same drug, and same quantity. Each of the claims in the results were for drugs supplied for more than a 7-day period.

The first prescription filled is designated as valid under HWT's methodology. The potential overpayment equals the amount paid for subsequent claims. For example, the HWT analysis found two claims of \$243.97 each for 90 50 mg tablets of Zoloft®<sup>5</sup> for the same recipient. These prescriptions were filled by two different providers 4 days apart and each prescription was for a 90-day supply. In this case, the potential improper payment contained in HWT's results is \$243.97 for the second claim.

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##### Data Limitations

As part of the pharmacy claims process, providers can override edits that caused a claim to be denied based on a variety of reasons, such as for therapeutic duplication. In addition, pharmacies can include a Submission Clarification Code to provide additional information regarding provider overrides for early refills, such as that it was for a starter dose, vacation supply, or lost prescription. First Health did not provide this data to EDS, the source of the paid claim data used by HWT, so we were unable to ascertain the extent to which any of the identified claims had such codes.

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<sup>5</sup>Zoloft® is an antidepressant that is used to treat depression and certain types of anxiety disorders, such as panic disorders.

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## Appendix III

### Technical Description of Algorithms

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In some cases, HWT was unable to calculate potential overpayments because the data provided did not contain the pricing elements needed for the calculations. Although these claims were included in the data provided to OVHA, they are not included in the estimated overpayment amount contained in this report.

In addition, recipient co-payments were not included in the data provided to HWT so such payments were not factored into the analysis.

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#### Algorithm No. 4: Near Duplicates, Same Provider

**\$364,021 in potential improper payments identified.**

---

##### Purpose

To identify two or more claims, filed by the same provider, that appear to be duplicates.

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##### Description

The First Health Services Pharmacy Provider Manual for Vermont Medicaid states that pharmacies should not dispense refills until 75 percent of the original days' supply has been utilized. This algorithm identifies claims that were billed by the same pharmacy provider within a 5-day period for the same recipient, same drug, and same quantity. Each of the claims in the results set was for drugs supplied for more than a 7-day period.

The first prescription filled is designated as valid under HWT's methodology. The potential overpayment equals the amount paid for subsequent claims. For example, the HWT analysis found two claims for the same recipient of \$317.52 each for 180 25 mg tablets of Seroquel®<sup>6</sup> that were reported as filled within 5 days of each other. In this case, the potential improper payment contained in HWT's results is \$317.52 for the second claim.

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<sup>6</sup>Seroquel® is a psychotropic drug for the treatment of many symptoms of schizophrenia and for acute mania associated with bipolar disorder.

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## Appendix III

### Technical Description of Algorithms

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#### Data Limitations

As part of the pharmacy claims process, providers can override edits that caused a claim to be denied based on a variety of reasons, such as for therapeutic duplication. In addition, pharmacies can include a Submission Clarification Code to provide additional information regarding provider overrides for early refills, such as that it was for a starter dose, vacation supply, or lost prescription. First Health did not provide this data to EDS, the source of the paid claim data used by HWT, so we were unable to ascertain the extent to which any of the identified claims had such codes.

In some cases, HWT was unable to calculate potential overpayments because the data provided did not contain the pricing elements needed for the calculations. Although these claims were included in the data provided to OVHA, they are not included in the estimated overpayment amount contained in this report.

In addition, recipient co-payments were not included in the data provided to HWT, so such payments were not factored into the analysis.

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#### Algorithm No. 5: Kit Billing Errors

**\$49,212 in potential improper payments identified.**

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##### Purpose

To identify instances where the pharmacist entered an inaccurate quantity for the drugs dispensed in a kit (products with at least two different or discrete items in the same package with a single NDC identifier).

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##### Description

In its work with Medicaid claims data in multiple states, HWT has found that some pharmacists make errors entering data, including recording inaccurate quantities dispensed, days supplied, and dosages. According to HWT, although the rationale for the error is not always apparent, it is often due to the billing provider entering the number of items in the kit or the number of days supplied when the appropriate quantity for the kit is often one.

The potential improper payment amount is derived by taking the actual amount paid, adjusted for other insurance and the dispensing fee, and subtracting what the claim amount should have been (i.e., multiplying the correct quantity by the lowest price).



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## Appendix III

### Technical Description of Algorithms

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Example of a potentially improperly paid claim:

<b>Drug</b>	Rabavert® Rabies Vaccine Kit
<b>Reported quantity dispensed</b>	5
<b>Days supplied</b>	5 days
<b>Amount paid</b>	\$638.83
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$126.92

In this case, HWT determined that the correct quantity should have been 1 kit, not the 5 that were billed and paid (it appears that the pharmacist may have recorded the number of days supplied as the quantity dispensed). Accordingly, the potential overpayment of this claim is:

$$[\$638.83 - \$4.25] - [1 \times \$126.92] = \$507.66$$

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#### Data Limitations

In some cases, HWT was unable to calculate potential overpayments because the data provided did not contain the pricing elements needed for the calculations. Although these claims were included in the data provided to OVHA, they are not included in the estimated overpayment amount contained in this report.

In addition, recipient co-payments were not included in the data provided to HWT, so such payments were not factored into the analysis.

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### Algorithm No. 6: Zithromax® Errors

**\$33,996 in potential improper payments identified.**

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#### Overview

To identify dispensed quantity errors associated with the medication Zithromax® brand of azithromycin, which is an antibiotic available in liquid, powder, capsule, and tablet form.

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## Appendix III

### Technical Description of Algorithms

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#### Description

This algorithm looks for instances in which the pharmacist has entered inaccurate quantities based on package size or an incorrect NDC or cases in which standard medical practice limits have been exceeded. The potential improper payment amount is derived by taking the actual amount paid, adjusted for other insurance and the dispensing fee, and subtracting what the claim amount should have been (i.e., multiplying the correct quantity by the lowest price).

HWT separated Zithromax® claims by the form in which the drug was dispensed as each of these delivery mechanisms have their own criteria for what constitutes a normal dosage and determination of the correct quantity. For example,

- According to the manufacturer, Zithromax® 250 mg tablets are normally prescribed at six tablets for a 5-day supply, six tablets for a 3-day supply, four tablets for a 1-day supply, or eight tablets for a 1-day supply. As part of calculating the estimated overpayment, HWT determined the correct quantity that should have been billed by assuming that the pharmacist dispensed at least one course of therapy of Zithromax 250 mg tablets based on the above manufacturer's statement.<sup>7</sup>

Example of a potentially improperly paid claim:

<b>Drug</b>	Zithromax® 250 mg tablets
<b>Reported quantity dispensed</b>	60
<b>Days supplied</b>	5 days
<b>Amount paid</b>	\$439.73
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$7.26

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<sup>7</sup>Claims for 12 tablets for a 28-day supply were also allowed.

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## Appendix III

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### Technical Description of Algorithms

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In this case, based on the manufacturer's recommended prescription, HWT determined that the correct quantity should have been 6 tablets, not the 60 that were billed and paid.

Accordingly, the potential overpayment of this claim is:

$$[\$439.73 - \$4.25] - [6 \times \$7.26] = \$391.92$$

- Zithromax® 100mg/5 ml and Zithromax® 200 mg/5 ml are prescribed in liquid form. According to the manufacturer, based on the recommended dose, the maximum allowed quantities are (1) 45 milliliters (mls) for a package size quantity of 15 mls, (2) 45 mls for a package size quantity of 22.5 mls, and (3) 60 mls for a package size quantity of 30 mls. HWT based the correct quantity part of its overpayment estimate on the assumption that the pharmacist dispensed a maximum dosage of Zithromax based on the strength cited above.

Example of a potentially improperly paid claim:

<b>Drug</b>	Zithromax® 200 mg/5 ml
<b>Package size</b>	15 mls
<b>Reported quantity dispensed</b>	200
<b>Days supplied</b>	5 days
<b>Amount paid</b>	\$394.59
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$2.05

In this case, based on the maximum dosage, HWT determined that the correct quantity should have been 45 mls, not the 200 mls that were billed and paid.

Accordingly, the potential overpayment of this claim is:

$$[\$394.59 - \$4.25] - [45 \times \$2.05] = \$298.09$$

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## Appendix III

### Technical Description of Algorithms

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#### Data Limitations

Recipient co-payments were not included in the data provided to HWT, so such payments were not factored into the analysis.

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#### Algorithm No. 7: Lovenox® errors

**\$109,823 in potential improper payments identified.**

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#### Purpose

To identify dispensed quantity errors associated with the anticoagulant, Lovenox®, which thins the blood and alters the body's normal blood-clotting process.

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#### Description

Lovenox® is a product that is dispensed in pre-filled syringes and is priced per ml. Depending on the NDC, these syringes contain from 0.3 to 1.0 mls of Lovenox®. In other states, HWT has found that pharmacists are often confused about billing the quantity of syringes dispensed versus the number of mls dispensed. This algorithm identifies claims that exceed the normal dosage and higher than twice-a-day dosing for Lovenox®.

For example, according to the manufacturer, the normal dosage for Lovenox® for most indications is two syringes per day for 30 mg (which translates to .3 ml)<sup>8</sup> and one syringe per day for higher strengths. HWT estimates overpayments for Lovenox® based on the assumption that the pharmacist dispensed the normal dosage of Lovenox® based upon the days supplied. The potential improper payment amount is derived by taking the actual amount paid, adjusted for other insurance and the dispensing fee, and subtracting what the claim amount should have been (i.e., multiplying the correct quantity by the lowest price).

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<sup>8</sup>In order to correctly bill for Lovenox®, pharmacists must use the metric decimal quantity.

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## Appendix III

### Technical Description of Algorithms

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Example of a potentially improperly paid claim:

<b>Drug</b>	Lovenox® 100 mg prefilled syringe
<b>Package size</b>	1
<b>Reported quantity dispensed</b>	60
<b>Days supplied</b>	25 days
<b>Amount paid</b>	\$3,935.62
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$62.74

In this case, based on the maximum dosage, HWT determined that the correct quantity should have been 25 syringes, not the 60 that were billed and paid.

Accordingly, the potential overpayment of this claim is:

$$3,935.62 - \$4.25 - [25 \times \$62.74] = \$2,362.87$$

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#### Data Limitations

Recipient co-payments were not included in the data provided to HWT, so such payments were not factored into the analysis.

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### Algorithm No. 8: Inhaler/Nasal Spray errors

**\$158,260 in potential improper payments identified.**

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#### Purpose

To identify instances in which the pharmacist has entered an inappropriate quantity for the inhaler or nasal spray dispensed.

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#### Description

Based on HWT's experience with Medicaid claims, HWT has found various reasons why a pharmacy may have billed an incorrect quantity for an inhaler or nasal spray, resulting in an overpayment. Accordingly, this algorithm

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## Appendix III

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### Technical Description of Algorithms

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identifies claims in which the pharmacist billed, or appeared to bill, (1) the number of puffs or actuations instead of the correct drug quantity, (2) an unreasonable quantity, exceeding the maximum normal dosage for a 34-day supply,<sup>9</sup> (3) an invalid package size instead of the appropriate quantity based on the NDC, (4) the medication strength instead of the correct quantity dispensed, (5) the package size multiplied by the days supplied instead of the amount dispensed, (6) a quantity that was 10 times or a multiple of 10 times the package size, and (7) a quantity of greater than 4 times the package size, which is a high dosage for the drug codes billed.

To determine the estimated overpayment, HWT assumed that the pharmacist dispensed at least one package or container of the product. The correct quantity was determined by the package size or the maximum metric quantity for 34 days, as applicable. The potential improper payment amount is derived by taking the actual amount paid, adjusted for other insurance and the dispensing fee, and subtracting what the claim amount should have been (i.e., multiplying the correct quantity by the lowest price).

Example of a potentially improperly paid claim:

<b>Drug</b>	Flovent® HFA 220 mcg inhaler <sup>10</sup>
<b>Reported quantity dispensed</b>	120
<b>Days supplied</b>	30 days
<b>Amount paid</b>	\$1,312.80
<b>Other insurance</b>	0
<b>Dispensing fee</b>	\$4.25
<b>Lowest price</b>	\$11.72

In this case, HWT determined that the correct quantity should have been 12, not the 120 that were billed and paid (it appeared that the pharmacy billed for the number of puffs or actuations instead of the correct drug quantity).

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<sup>9</sup>A 34-day supply was used because the First Health Pharmacy Provider Manual states that non-maintenance drugs (i.e., medications that are used on an as-needed basis) are subject to a per claim days' supply maximum limit of 34 days.

<sup>10</sup>Flovent® HFA is an inhalation aerosol that is used by patients with asthma.

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## Appendix III

### Technical Description of Algorithms

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Accordingly, the potential overpayment of this claim is:

$$[\$1,312.80 - \$4.25] - [12 \times \$11.72] = \$1,167.91$$

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### Data Limitations

In some cases, HWT was unable to calculate potential overpayments because the data provided did not contain the pricing elements needed for the calculations. Although these claims were included in the data provided to OVHA, they are not included in the estimated overpayment amount contained in this report.

In addition, recipient co-payments were not included in the data provided to HWT, so such payments were not factored into the analysis.

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## Appendix IV

### Comments from the Director of OVHA

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**Office of Vermont Health Access**  
312 Hurricane Lane, Suite 201  
Williston, Vermont 05495  
802-879-5900

*Agency of Human Services*

December 19, 2006

Mr. Randolph D. Brock, State Auditor  
Office of the State Auditor  
133 State Street  
Montpelier, Vermont 05633-5101



RE: Medicaid Draft Report – Medicaid Pharmacy Claims

Dear Mr. Brock:

On behalf of the Agency of Human Services and this Office, enclosed is the response of the Office of Vermont Health Access (OVHA) to the draft report referenced above.

I apologize that we were unable to provide this as you requested by Friday, December 15<sup>th</sup>. My staff has been engaged in numerous activities related to the single state audit and that made it difficult to meet your deadline.

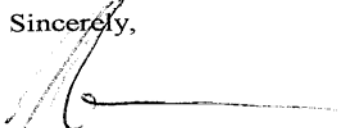
I can assure you that OVHA shares your assessment of the value of the use of independent data mining resources. In January 2007 OVHA plans to initiate a request for proposals and bids to procure one or more vendors to identify overpayments not only in pharmacy claims but in all claim types. As discussed with your staff, OVHA has now secured assurances from its past pharmacy benefit administrator, First Health Services Corporation, that a complete pharmacy claims file will be provided. This file will be used to explore the potential improper payments identified in your report.

We will await your final report and understand this is only the first of several Medicaid-related reports.

Let me take this opportunity to commend your staff and your contractor, HWT, on the thorough and well-prepared report and thank you for providing us with the opportunity to comment prior to its finalization.

Please contact my Deputy, Ann Rugg at 802-879-5901 or at [annr@ahs.state.vt.us](mailto:annr@ahs.state.vt.us) if you have any questions or concerns.

Sincerely,



Joshua Slon  
Director

cc: Cynthia D. LaWare, Secretary, Agency of Human Services



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## Appendix IV

### Comments from the Director of OVHA

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Vermont State Auditor Report  
RPT. NO. 06-04  
Draft Issued December 4, 2006  
Office of Vermont Health Access Response to Draft

#### **COMMENTS**

##### **Cover letter**

The letter states "Experience in similar cases involving the same algorithms in other states typically results in collections in the 60 to 70 percent range." This accurately reflects what OVHA understood from HWT staff; that is, that is the rate of collection on certain claims when all claim elements were present when the algorithms were applied. The report reflects and OVHA has indicated verbally and will reiterate in this response that the data reviewed by HWT did not include pertinent data elements that would modify HWT's findings. As crafted, the sentence may lead readers to believe that a 60 to 70 percent return is possible on the \$2.2 million claims identified thus far. Even if the \$2.2 proved to be fully documented the majority of that is attributed to "unreasonable quantities" and HWT has indicated that condition generally nets a 50 percent rate of collection (pages 3 and 11). Modified language might be: "Experience in similar cases involving the same algorithms in other states typically results in collections in the 50 to 70 percent range when all claims data elements necessary are available for the analysis. In Vermont's case, certain of these elements were not available in the period of analysis; particularly, data indicators showing the presence of prior authorization segments and valid reasons for pharmacy overrides of claims' processing edits. Affected providers should be given the opportunity to submit documentation to support any questioned payments."

##### **Page 3**

As referenced above, OVHA understands that HWT's projected collections are based on their experience after a full claims review. Since that was not possible as acknowledged in the first point in the findings, OVHA suggests the following sentence modification: "The data mining contractor that we used estimates collection rates based on full claims review. After pharmacy documentation is obtained it estimates that, based . . . ."

##### **Page 10**

OVHA understands that the CMS requirement for payment within 60 days of identified improper payment applies to confirmed overpayments. The language here implies that Vermont must pay CMS based on this finding. OVHA suggests that this point should be clarified.

Again OVHA notes its understanding of percentage collections based on full claims data. OVHA also notes that HWT indicates that even then "unreasonable quantity" dollars only net collections of 50 percent (pages 3 and 11). Since \$1.4 million of the \$2.2 million in claims identified in this report are related to "unreasonable quantity" the reference to 60

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to 70 percent collections will suggest an unreasonable expectation of return. OVHA suggests substituting "50 to 70 percent".

#### **Page 11**

In light of previous comments, OVHA suggests a change in header to the third column to "Estimated recovery @ 50/65 collection\*" to assure clarity.

#### **Page 13**

It should be noted that while the contract with First Health Services Corporation was effective in July 2001, it did not begin processing claims until November 2001.

Additionally, OVHA is concerned that comments as worded here suggest that First Health improperly processed these claims. The edits designed to prevent improper payments existed. This review did not have complete claims data. In the absence of that data, OVHA believes it inappropriate to imply that the potential improper payments identified here indicate that First Health erred.

#### **RESPONSE TO THE RECOMMENDATIONS**

OVHA has always applied claims edits of the type described that require a pharmacy response to make it possible to process claims. As of January 1, 2006 OVHA no longer used First Health Services Corporation to process claims as they had for the review period here. As a result, the claims file information available to HWT did not contain all of the relevant claims information to demonstrate the use of those edits.

OVHA has reviewed claims identified in this report and claims of a similar nature to the extent possible in the absence of all claims data elements. Where clear errors of the sort have been identified, OVHA has initiated pursuit. Beyond that, OVHA has felt that asking pharmacies for detailed claims documentation on the number of claims involved was inappropriate until all other avenues for obtaining necessary information have been explored.

On December 4 and December 12, 2006, OVHA obtained verbal commitments from First Health Services Corporation indicating that it will provide a claims file with all available data elements by January 2007. We understand, though, that at this time HWT is no longer available as a resource under the contract with the Office of the State Auditor.

OVHA is retooling its program data and surveillance and utilization review (SUR) activities into a Program Integrity Unit to make it possible to use prospective, concurrent, and retrospective analysis of utilization patterns to fully identify suspected waste, underuse, overuse, misuse, and abuse. A director has been selected and SUR and some data staff have been identified. Two data positions are currently under recruitment. Also

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in recruitment are two positions to perform program and operations reviews and investigations. It is anticipated that many, if not all, of this staff will be hired in January 2007. This staff will then be available to work with the OVHA's program operations staff including its Pharmacy Unit.

With the formation of the Program Integrity Unit, OVHA plans to initiate a request for proposals and bids to procure a vendor or vendors to identify overpayments in pharmacy claims as well as in other claim types. As noted in this report, HWT and a number of such vendors perform these services for Medicaid programs and insurers on a contingency basis where their payments are based on their success in collections. This approach will make it possible to secure sufficient resources to identify potential overpayments and pursue recoveries without additional administrative expense.

While such a vendor will be used to review the claims identified by HWT, it must be noted that pharmacy claims identified in HWT's analysis may not be precisely those claims that are subsequently subject to recovery. As indicated in the report, HWT uses proprietary methodologies in applying identified algorithms. While HWT might prove to be a bidder on an OVHA procurement there can be no guarantee that it will be the selected vendor. As such a selected vendor's approaches might vary resulting in different findings on the HWT identified claims as well as different individual claims identified. However, it can be reasonably assumed that any qualified vendor would be able to identify appropriate claims not only of the types identified in this report but of other types as well.

OVHA has reviewed existing claims edit rules as currently applied by the PBA contractor, MedMetrics Health Partners. MedMetrics will be working with our Pharmacy and Program Integrity Units to assure that appropriate safeguards are in effect to contain errors and overpayments in claims.