groups are generally funded by hospitals, we were surprised that perceptions of hospital support were not associated with risks for burnout and low satisfaction. This suggests that even though relationships with their hospital are critical for financial and strategic success, direct support from divisions appears to be more critical for hospitalists’ career satisfaction and burnout. Nearly 90% of respondents reported to a general internal medicine chief, which suggests a need for general internal medicine division chief support to balance work demands, schedules, and protected time in a manner consistent with academic success.

Our study had several important limitations. First, we studied only a subset of hospitalists from primarily larger academic institutions known to the study authors. It is likely that scholarly infrastructure, support, and expectations are different in these institutions than other types of teaching hospitals, reducing the generalizability of our data. Next, our study design was prone to response bias and we did not assess the actual vs reported academic productivity of respondents. Finally, low satisfaction, stress, and burnout were assessed through subjective assessment tools.

In conclusion, few academic hospitalists have succeeded in achieving senior levels of promotion. This is likely owing, in part, to the youth of the field and inadequate amounts of protected scholarly time fueled by high demands for nonteaching clinical work. However, the resultant high levels of stress and burnout and low satisfaction may also present a real threat to the vitality of a budding field. Targeted efforts and interventions are needed to stem this tide in order to create fulfilling, sustainable, and scholarly, robust academic hospitalist careers.

Jeffrey J. Glasheen, MD
Gregory J. Misky, MD
Mark B. Reid, MD
Rebecca A. Harrison, MD
Brad Sharpe, MD
Andrew Auerbach, MD, MPH

Author Affiliations: Section of Hospital Medicine, Division of General Internal Medicine, University of Colorado Denver, Aurora (Drs Glasheen and Misky); Division of Hospital Medicine, Denver Health Medical Center, Denver, Colorado (Dr Reid); Division of Hospital Medicine, Department of Medicine, Oregon Health & Science University, Portland (Dr Harrison); and Division of Hospital Medicine, University of California, San Francisco (Drs Sharpe and Auerbach).

Correspondence: Dr Glasheen, Section of Hospital Medicine, Division of General Internal Medicine, University of Colorado Denver, Mail Stop F782, 12401 E 17th Ave, Ninth Floor, Aurora, CO 80045 (jeffrey.glasheen@ucdenver.edu).

Author Contributions: Study concept and design: Glasheen, Misky, Reid, Harrison, Sharpe, and Auerbach. Acquisition of data: Glasheen, Misky, Reid, Sharpe, and Auerbach. Analysis and interpretation of data: Glasheen, Misky, Sharpe, and Auerbach. Drafting of the manuscript: Glasheen, Misky, Harrison, Sharpe, and Auerbach. Critical revision of the manuscript for important intellectual content: Glasheen, Misky, Reid, Harrison, Sharpe, and Auerbach. Statistical analysis: Misky and Auerbach. Administrative, technical, and material support: Misky and Auerbach. Study supervision: Glasheen, Misky, and Reid.

Financial Disclosure: None reported.

Funding/Support: Dr Auerbach was supported by a Mid-Career Research Development Award (K24HL09837) from the National Heart, Lung, and Blood Institute during the period of this study.

Previous Presentation: This information was presented as a research poster at the Society of Hospital Medicine Annual Meeting; May 15, 2009; Chicago, Illinois.


HEALTH CARE REFORM

Enforcement Actions Involving Medicaid Fraud and Abuse, 1996-2009

Medicaid expenditures in 2008 were $321 billion, accounting for 16% of domestic health care spending and coverage of 60 million individuals.1 Overall, Medicaid accounts for the second largest state budgetary expenditures (17%). In recent years, state officials have focused on identifying fraud in an effort to control Medicaid expenditures. Twenty-three states and the District of Columbia adopted state False Claims Act (FCA) legislation to facilitate fraud investigations.2 This legislation, modeled after federal legislation, allows private citizens, termed qui tam relators, to file lawsuits alleging fraud by Medicaid contractors and to be awarded part of the recoveries. Historically, 90% of Medicare fraud has involved qui tam relators, resulting in financial recoveries of $9.3 billion between 1996 and 2005.3 No study has reported similar data for Medicaid. We report on Medicaid FCA investigations from 1996 through 2009.

Methods. Data sources included Web sites maintained by state attorneys general and the Lexis/Nexis News database (1996 through 2009) (search terms False Claims Act AND Medicaid and individual state names). Data on industry, date, violation, and recovery amount were abstracted.

Results. Between 1996 and 2000, no concluded Medicaid fraud FCA cases were found. Between 2001 and 2005, total recoveries for the 12 concluded cases were $59 million. All of these cases had been initiated by qui tam relators. Between 2006 and 2009, 44 state-led FCA health care cases were concluded, and $5.4 billion was recovered. Only one-third of these cases were initiated by qui

Critical revision of the manuscript for important intellectual content: Glasheen, Misky, Reid, Harrison, Sharpe, and Auerbach. Statistical analysis: Misky and Auerbach. Administrative, technical, and material support: Misky and Auerbach. Study supervision: Glasheen, Misky, and Reid.

Financial Disclosure: None reported.

Funding/Support: Dr Auerbach was supported by a Mid-Career Research Development Award (K24HL09837) from the National Heart, Lung, and Blood Institute during the period of this study.

Previous Presentation: This information was presented as a research poster at the Society of Hospital Medicine Annual Meeting; May 15, 2009; Chicago, Illinois.


Health Care Reform

Enforcement Actions Involving Medicaid Fraud and Abuse, 1996-2009

Medicaid expenditures in 2008 were $321 billion, accounting for 16% of domestic health care spending and coverage of 60 million individuals.1 Overall, Medicaid accounts for the second largest state budgetary expenditures (17%). In recent years, state officials have focused on identifying fraud in an effort to control Medicaid expenditures. Twenty-three states and the District of Columbia adopted state False Claims Act (FCA) legislation to facilitate fraud investigations.2 This legislation, modeled after federal legislation, allows private citizens, termed qui tam relators, to file lawsuits alleging fraud by Medicaid contractors and to be awarded part of the recoveries. Historically, 90% of Medicare fraud has involved qui tam relators, resulting in financial recoveries of $9.3 billion between 1996 and 2005.3 No study has reported similar data for Medicaid. We report on Medicaid FCA investigations from 1996 through 2009.

Methods. Data sources included Web sites maintained by state attorneys general and the Lexis/Nexis News database (1996 through 2009) (search terms False Claims Act AND Medicaid and individual state names). Data on industry, date, violation, and recovery amount were abstracted.

Results. Between 1996 and 2000, no concluded Medicaid fraud FCA cases were found. Between 2001 and 2005, total recoveries for the 12 concluded cases were $59 million. All of these cases had been initiated by qui tam relators. Between 2006 and 2009, 44 state-led FCA health care cases were concluded, and $5.4 billion was recovered. Only one-third of these cases were initiated by qui

Critical revision of the manuscript for important intellectual content: Glasheen, Misky, Reid, Harrison, Sharpe, and Auerbach. Statistical analysis: Misky and Auerbach. Administrative, technical, and material support: Misky and Auerbach. Study supervision: Glasheen, Misky, and Reid.

Financial Disclosure: None reported.

Funding/Support: Dr Auerbach was supported by a Mid-Career Research Development Award (K24HL09837) from the National Heart, Lung, and Blood Institute during the period of this study.

Previous Presentation: This information was presented as a research poster at the Society of Hospital Medicine Annual Meeting; May 15, 2009; Chicago, Illinois.

We identified 56 successfully concluded Medicaid FCA investigations associated with $5.5 billion in financial recoveries, with almost all of the recoveries occurring since 2006. The most pervasive allegations involved billing fraud and off-label marketing by pharmaceutical manufacturers. While all of the initial Medicaid FCA settlements involved qui tam relators, the types of Medicaid fraud varied according to industry (Table). Pharmaceutical manufacturers accounted for the largest number and the greatest amount of financial recoveries: $4.6 billion (85% of all Medicaid FCA recoveries) for 24 cases (43% of Medicaid FCA cases). The 2 largest recoveries (in dollars) involved pharmaceutical manufacturers. Eli Lilly paid $1.4 billion to resolve allegations of fraudulent marketing of pharmaceuticals. Purdue Pharma paid $634.5 million and pleaded guilty to misbranding charges that sales representatives had misled Medicaid providers to believe that oxycodeone was nonaddictive. Hospitals and hospital networks accounted for the second largest percentage of financial recoveries, $490 million (9% of the total Medicaid FCA recoveries), resolving 9 cases. The largest recovery from a single hospital network ($225 million) was received from a settlement with a Medicaid Health Maintenance Organization, resolving allegations that it discouraged participation of pregnant women in a Medicaid program. Settlements with pharmacy chains accounted for $221 million and 6 cases. Three cases resolved allegations of switching prescriptions for Medicaid beneficiaries to more expensive capsule (vs tablet) formulations or billing for pharmaceuticals not received by patients.

Table. State-Initiated False Claims Act Case Settlements Involving Medicaid Fraud by Industry and Type of Fraud, 1996-2009

<table>
<thead>
<tr>
<th>Industries</th>
<th>State-Initiated Cases</th>
<th>Type of Medicaid Fraud</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>No. of Cases</td>
<td>Total Recoveries, $, in Millions</td>
</tr>
<tr>
<td>Pharmaceuticals</td>
<td>24</td>
<td>4688</td>
</tr>
<tr>
<td>Hospital networks, hospitals, university medical centers</td>
<td>9</td>
<td>490</td>
</tr>
<tr>
<td>Pharmacy</td>
<td>6</td>
<td>221</td>
</tr>
<tr>
<td>Nursing homes</td>
<td>5</td>
<td>28</td>
</tr>
<tr>
<td>Medical devices</td>
<td>3</td>
<td>43</td>
</tr>
<tr>
<td>Home health care</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Durable medical equipment</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Laboratory</td>
<td>0</td>
<td>NA</td>
</tr>
<tr>
<td>End-stage renal disease providers</td>
<td>0</td>
<td>NA</td>
</tr>
<tr>
<td>Health insurance</td>
<td>0</td>
<td>NA</td>
</tr>
<tr>
<td>Medical professionals and small practices</td>
<td>0</td>
<td>NA</td>
</tr>
<tr>
<td>Other</td>
<td>7</td>
<td>56</td>
</tr>
<tr>
<td>Total</td>
<td>56</td>
<td>5529</td>
</tr>
<tr>
<td>% Of total settlements (% of cases)</td>
<td>34 (64)</td>
<td>4 (13)</td>
</tr>
</tbody>
</table>

Abbreviation: NA, not applicable.

tam relators. The types of Medicaid fraud varied according to industry (Table). Pharmaceutical manufacturers accounted for the largest number and the greatest amount of financial recoveries: $4.6 billion (85% of all Medicaid FCA recoveries) for 24 cases (43% of Medicaid FCA cases). The 2 largest recoveries (in dollars) involved pharmaceutical manufacturers. Eli Lilly paid $1.4 billion to resolve allegations of fraudulent marketing of pharmaceuticals. Purdue Pharma paid $634.5 million and pleaded guilty to misbranding charges that sales representatives had misled Medicaid providers to believe that oxycodeone was nonaddictive. Hospitals and hospital networks accounted for the second largest percentage of financial recoveries, $490 million (9% of the total Medicaid FCA recoveries), resolving 9 cases. The largest recovery from a single hospital network ($225 million) was received from a settlement with a Medicaid Health Maintenance Organization, resolving allegations that it discouraged participation of pregnant women in a Medicaid program. Settlements with pharmacy chains accounted for $221 million and 6 cases. Three cases resolved allegations of switching prescriptions for Medicaid beneficiaries to more expensive capsule (vs tablet) formulations or billing for pharmaceuticals not received by patients.

Comment. We identified 56 successfully concluded Medicaid FCA investigations associated with $5.5 billion in financial recoveries, with almost all of the recoveries occurring since 2006. The most pervasive allegations involved billing fraud and off-label marketing by pharmaceutical manufacturers. While all of the initial Medicaid FCA settlements involved qui tam realtors, as was the case with 90% of Medicare FCA settlements in this period, two-thirds of the more recent Medicaid settlements did not involve qui tam relators. These investigations were frequently initiated by state attorneys general or Medicaid officials and conducted jointly with federal investigators and other state attorneys general. The investigations have primarily involved pharmaceutical manufacturers, who account for $4.7 billion in financial recoveries and 43% of successfully concluded Medicaid FCA investigations.

Our analysis has some limitations. Our data consist of publicly disseminated information. However, there are no public databases containing information on health care fraud. With continuing Medicaid growth, the number of fraud investigations initiated by state officials will increase. The consequences of these efforts have the potential to reduce costs and improve the quality of care received by Medicaid enrollees.

Zaina P. Qureshi, PhD, MPH
Ying Liu, PhD
Oliver Sartor, MD
Yong H. Chu, MPH
Charles L. Bennett, MD, PhD, MPP

Author Affiliations: South Carolina Center of Economic Excellence for Medication Safety and Efficacy and the Southern Network on Adverse Reactions (SONAR), Department of Clinical Pharmacy and Outcome Sciences, South Carolina College of Pharmacy (Drs Qureshi and Bennett) and Department of Health Promotion, Education and Behavior, Arnold School of Public Health.
(Mr Chu), University of South Carolina, Columbia; Department of Microbiology and Immunology, Indiana University School of Medicine, Indianapolis (Dr Liu); Tulane Cancer Center and Departments of Medicine and Urology, Tulane Medical School, New Orleans, Louisiana (Dr Sartor); and Hollings Cancer Center, Medical University of South Carolina, Charleston (Dr Bennett).

Correspondence: Dr Bennett, South Carolina College of Pharmacy, 715 Sumter St, Ste 311, Columbia, SC 29208 (charlesleebennett@gmail.com).

Author Contributions: Study concept and design: Qureshi, Sartor, and Bennett. Acquisition of data: Qureshi, Sartor, Chu, and Bennett. Analysis and interpretation of data: Qureshi, Liu, Sartor, Chu, and Bennett. Drafting of the manuscript: Qureshi, Chu, and Bennett. Critical revision of the manuscript for important intellectual content: Qureshi, Liu, Sartor, Chu, and Bennett. Statistical analysis: Qureshi, Chu, and Bennett. Obtained funding: Bennett. Administrative, technical, and material support: Bennett. Study supervision: Qureshi, Sartor, and Bennett.

Financial Disclosure: None reported.


Comments and Opinions

Dual Antiplatelet Therapy and the Risk of Bleeding

We applaud Hansen and colleagues for calling attention to the risk of bleeding with single or combined therapy with warfarin, aspirin, and clopidogrel in patients with atrial fibrillation. Although the authors highlight the increased risk of bleeding with all combinations of these medications, we believe that one observation in this article is worthy of special emphasis, since it is not only important but also may be unknown to many clinicians. Figure 3 of their article shows that the risk of bleeding for patients receiving combined treatment with aspirin and clopidogrel, often referred to as dual antiplatelet therapy (DAPT), was significantly higher than the risk for patients treated with warfarin alone. This finding should be important to clinicians who make treatment recommendations to patients with atrial fibrillation and vascular disease. It is consistent with the earlier Atrial Fibrillation Clopidogrel Trial With Irbesartan for Prevention of Vascular Events (ACTIVE W) trial, in which the risk of minor bleeding and total bleeding was significantly higher for those treated with DAPT than with oral anticoagulation.

There are several important implications of these findings. First, because DAPT is both less effective and more risky than oral anticoagulation therapy for most patients with atrial fibrillation, there would seem to be few, if any, circumstances in which DAPT would be justified for stroke prophylaxis in this condition. Second, these findings should help clinicians counsel patients for whom a drug-eluting stent (DES) is a treatment option. In light of these findings, clinicians considering whether to recommend a DES should carefully assess a patient’s risk of bleeding and falls, much as they would when considering warfarin anticoagulation. It should be remembered that DAPT is recommended for an even longer treatment duration after DES placement than oral anticoagulants (OACs) are for deep venous thrombosis or pulmonary embolism. Third, the relative bleeding risk of DAPT compared with OACs should be of great interest to those who work to ensure patient safety. The Joint Commission Hospital National Patient Safety Goals include a measure to reduce harm from anticoagulation therapy (NPSG.03.05.01). This measure targets patients receiving any form of heparin or warfarin, but there is no similar safety goal for patients receiving DAPT. We believe that the risk of bleeding for patients receiving DAPT should be better recognized and appreciated.

We appreciate the interest of our esteemed colleagues, Ziegelstein et al, in our work. They raise an important issue of the bleeding risk with dual aspirin and clopidogrel therapy in patients with atrial fibrillation. We share their thoughts and agree that this issue merits special emphasis. Therefore, we would like to highlight 2 clinical important messages.

First, dual aspirin and clopidogrel should not be a treatment regime on patients who do not receive OAC therapy...