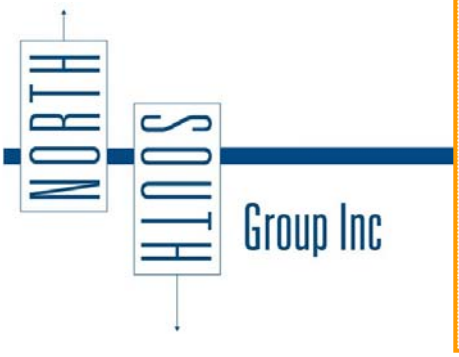
NOVA SCOTIA DEPARTMENT OF HEALTH

PHYSICIAN SERVICES



AUDIT OF THE DEPARTMENT OF MEDICINE ALTERNATIVE FUNDING ARRANGEMENT

Submitted By:
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Tender # : 60122326
Final Report

February 4, 2005

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EXECUTIVE SUMMARY

Alternative Funding Plans (AFPs), as relatively innovative models for the financing and provision of specialist medical services, require new systems of management. The Department of Medicine AFP has provided some important benefits for the province's health care system, notably in terms of recruitment and retention of academic physician specialists; in redefining delivery of specialist services; and in promoting more integrated interdisciplinary care .The DOM AFP has introduced a system of rationalised specialist services, based on triage, and has enabled the DOM to develop and implement well-defined clinical guidelines and wait time standards. At the same time, as a new form of physician remuneration, the DOM AFP has also brought to light some key concerns, notably associated with management and control issues, which require concerted action by all major stakeholders to effectively address. The DOM AFP Audit Report proposes measures to address these concerns and strengthen the operations of AFPs in Nova Scotia. As the largest and most comprehensive AFP in Nova Scotia, it has provided an important case study of AFPs, with findings applicable and relevant to other systems of alternative remuneration. The proposed measures should assist to optimize benefits for Nova Scotians, in terms of patient access, quality of care, and value for money for public resources.

In June 2004, North South Group, Inc., was contracted by the Nova Scotia Department of Health (Physician Services) to undertake an Audit of the Department of Medicine Alternative Funding Plan. The mandate and scope of this assignment was described as follows:

- Perform a financial audit of the funds provided under the Department of Medicine AFP over the past three fiscal years;
- Perform a value for money audit on the operations of the DOM AFP;
- Provide an analysis and evaluation of contract management and implementation processes and recommend any suggestions for improvement;
- Provide an analysis of performance evaluation and any recommendations for improvement; and,
- Final audit report on the findings under both financial and value for money audit.

The audit assignment was organised into three major work activities.

1. Financial audit of DOM AFP for fiscal years 2001, 2002 and 2003;
2. Value for Money Audit; and,
3. Evaluation.

For each of these general components, methodologies, workplans and research instruments were designed, developed and submitted to the NSDOH for approval. These are described in detail in this Report. The audit team's approach also included an intensive schedule of meetings and interviews with all principal stakeholders of the DOM AFP, which included: Dalhousie University Faculty of Medicine; the Department of Medicine with its 16 divisions; the Capital

District Health Authority; Doctors Nova Scotia (MSNS); Atlantic Blue Cross Corporation; and, the Nova Scotia Department of Health.

Alternative funding mechanisms were introduced in Nova Scotia in the mid-nineties to respond to specific challenges associated with the provision of physician services, such as rural access, coverage of emergency services, and payment of university-based specialists. Like most other provinces and territories in Canada, Nova Scotia has been moving towards alternative funding systems as the limitations of the fee for service system have become more apparent, and as the challenges of recruiting and retaining specialist physicians in a national marketplace are recognized. Perceived benefits of AFPs included improved recruitment and retention of academic specialists; stabilization of specialist care and education in undergraduate, postgraduate and continuing medical education; the potential to introduce changed patterns of clinical practice and more appropriate care, as a result of different financial incentives; increased time for research and teaching; more rational health human resource planning; and greater predictability of expenditures.

Alternative payments across Canada have increased by approximately 40% during the period 2000 to 2002. AFPs in Nova Scotia have grown significantly since their introduction, from approximately $12 million in 1992 to $166 (projected) in the current fiscal year (04/05). 64% of physicians in Nova Scotia are paid through alternative modes of remuneration, and of those, 21 % are paid mainly through AFPs.

While AFPs have assisted the Nova Scotia DOH in addressing various solutions to medical services delivery, they have, at the same time, raised significant managerial concerns and challenges. The management of academic health sciences centers, such as the Capital District Health Authority/Dalhousie Department of Medicine is a complex operation, with multifaceted activities and numerous stakeholders. It is characterised by multiple, potentially conflicting, missions, goals and roles, which include patient care, teaching and research. Governance and authority structures are affected by the regionalisation of health care in Nova Scotia, and management is further compounded by multiple reporting relationships, matrix organizational systems, and both employee and non-employee working relationships. At the same time, rapidly evolving changes in clinical delivery of health care and advances in health care technologies have a strong impact on the operations of academic health science centers. Challenges which have emerged, and which are endemic to most academic health science centers across the country, include the difficulty in establishing clear objectives; expected outcomes and deliverables; the lack of responsive information systems; and the general absence of reporting and evaluation frameworks.

These challenges necessarily had an impact upon the audit of the DOM AFP. The lack of a relevant information base upon which to conduct the required before and after comparisons for a value for money audit was a significant limitation for the audit team. Weak and fragmented pre and post AFP data for many areas of investigation precluded the development of clear and unambiguous findings relating to economy, efficiency and effectiveness. Likewise, policy and operational ambiguities regarding shadow billing posed problems in terms of arriving at

conclusions on performance of the AFP. The lack of clarity on numerous provisions in the AFP contract, such as definition and determination of FTE, vacancy clauses, the clinical/academic work breakdown, and others, seriously impaired the audit team's ability to reach unequivocal conclusions. At the same time, and in light of these considerations, the project team adopted a capacity development approach which carried out the audit assignment with a view to developing principles, recommended practices and administrative requirements to more effectively manage future AFPs. Lessons learned were highlighted, and best practices suggested. An accountability model is also included in one of the report's appendices, as a possible model to design future AFP management frameworks.

The audit process necessarily had to be guided by the contractual instruments which had been developed for the AFP and agreed to by the parties. This raised two major provisions:

- The AFP contract stated that deliverables would be developed by the parties, failing which, directed that the evaluation of the AFP would be conducted on the basis of shadow billing information; and,
- The AFP provided that there would be a determination of what portion of the Minister's funding was to be allocated as a Special Increment for Teaching.

However, the audit team found that there was no subsequent agreement by the parties on AFP deliverables, nor any identification of the Special Increment for Teaching. Accordingly, and based on this limitation, the project team was not able to conclude that the AFP has offered the Province value for money. However, given the intent and objectives of the AFP, which made reference to the "unique and special combination of clinical, teaching, research and administrative activities for which a system of payment other than fee for service is appropriate" [DOM AFP Preamble], the team elected to adopt a broader and more comprehensive approach to the audit, which utilized multiple research methods and instruments, so as to obtain a broader perspective on the performance and productivity of the DOM AFP. An economy/efficiency/effectiveness framework was designed and implemented as part of the value for money analysis, as was a process evaluation, which examined AFP design, operations and contractual compliance. While the analysis resulted in the general finding that the DOM has continued to provide high quality clinical services, which clearly respond to patient health care needs, and to carry out its teaching, research and administrative functions, what is less clear is whether the DOH has obtained value for money for the Minister's funding of $82.2 Million over the AFP contract term, as compared with the cost of services which would have been provided under a fee for service arrangement. With no clearly defined AFP deliverables, outcomes or performance targets, the value for money under an AFP system cannot be accurately analysed, measured nor audited.

However, the audit did bring to light many important findings. As stated above, benefits of the AFP are noteworthy: the recruitment and retention of specialists in Nova Scotia has been effectively enhanced; the DOM academic program is considered to have been strengthened under the AFP; clinical care is said to be more rational and appropriate, with tertiary and quaternary specialists treating more acute and complex cases; the 16 divisions of the Department of

Medicine are considered more viable and sustainable; the AFP has promoted increased multi-disciplinary care provided by teams of health professionals, as well as more integration among specialty areas; clinical guidelines, a triage system, and a commitment to more evidence-based care have been developed. Quality of care is considered to have remained high; physicians are engaging in more health promotion and disease prevention; DOM specialists are able to engage in a balance of clinical and academic activities; and the AFP has contributed to a better lifestyle and worklife quality for tertiary and quaternary specialists.

At the same time, serious weaknesses and challenges associated with the AFP have emerged. Most noteworthy is the lack of an accountability framework against which to measure performance and productivity of AFP-funded physicians. The lack of specific deliverables and performance targets has precluded the capacity of the auditors to measure the economy, efficiency and effectiveness of the AFP system. Furthermore, the lack of a clear determination of the clinical and academic ratio for AFP physicians impaired the capacity to assess value for money for the health care system, and to draw any meaningful conclusions from the financial audit over the contract term, as compared with similar expenditures under the fee for service system. Clearly, from the cross-Canada comparison undertaken by this study, it is evident that almost all jurisdictions are experiencing similar challenges in the administration of their alternative payment models. The administrative infrastructure to effectively manage AFPs is still evolving, and has not kept pace with the policy decisions of most ministries of health to implement these alternative systems.

In terms of the analyses that it was able to conduct, the audit team brought to light many important findings. With respect to the Financial Audit, it was found that while financial administration practices generally adhered to accepted accounting principles, there were several issues which were raised for further examination, such as the intermingling of health and education funding; the provision of overhead support from AFP funding, and control features. Likewise, the Value for Money Audit raised many issues which require immediate attention so as to make AFPs more accountable. These include the development of a financial formula for the development of AFPs; a system for determination of FTEs requirements; better definition of the role of CDHA; provisions to deal with vacancies, absences, shadow billing, clinical workload indicators, information systems, overhead formulas, and many others.

The Value for Money analysis included a survey conducted to allow for a comparison of clinical services in the DOM before and after the AFP; probing for any changes to access to services, volume of services and quality of care. Eleven respondent audiences were identified, comprised of AFP stakeholders; these included Dalhousie Faculty of Medicine senior officials; all Department of Medicine full time and part time physicians; hospital CEOs and Medical Directors for the CDHA and all District Health Authorities, DOM residents; CDHA/DOM nurse managers; Department of Health senior officials, referring physicians; specialists outside of the AFP; Medical Society of Nova Scotia (Doctors Nova Scotia) and CDHA Family Practice; and patients of DOM physicians. Responses brought to light a significantly different perspective from those within and outside the AFP arrangement. For DOM specialists, the AFP was seen in very positive terms, enabling a better balance of clinical and academic activities; enhanced

service delivery and better patient care; more collaborative care; more appropriate and rational care in terms of urgency and acuity; and more emphasis on health promotion and disease prevention activities. This view was largely supported by CDHA and the Dalhousie administration. On the other hand, those outside the AFP pointed to a deterioration in access to specialists and a reduction in volume of services, together with lack of patient follow up and a view that non-clinical activities had taken precedence over patient care. Of particular concern for DOH managers is a potential breakdown of communication and continuity of care between primary caregivers and academic specialists, which requires remedial action.

It must be emphasized that, for patients, there was no noticeable change in the quality of care provided by their specialists before and after the AFP. Some concerns were raised about wait times for appointments, but quality of care was rated highly by the majority of patients surveyed.

The audit also carried out a process evaluation, which examined contract management and operations, and assessed conformity of the AFP with DOH and CDHA goals and objectives. The evaluation also examined the AFP development process, performance management, controls and accountability. Respondent groups included DOH, Dalhousie FOM and DOM, CDHA, Doctors Nova Scotia and the Nova Scotia Government Treasury Board. Findings showed general conformity with provincial and regional goals and objectives, although the need for better definition of AFP objectives and policy was highlighted. Likewise, the evaluation findings emphasize the importance of establishing better accountability for the AFP through such measures as clear deliverables, performance indicators, targets and expected outcomes. A more coherent and transparent negotiation process was also seen as desirable, with more meaningful involvement by all signatories. The importance of ensuring adequate resources for the effective management of AFPs was also underlined: these include more resources in the Physician Services of DOH; a more responsive, integrated and strategic information system to capture AFP activity; improved controls and monitoring; and the introduction of performance incentives to enhance productivity.

The audit also included a comparative analysis with other jurisdictions across the country, and brought to light many commonalities shared by the various Ministries and Departments of Health. The report provides a description of the various arrangements concerning alternative payment systems in other provinces and territories, and presents some findings of interest and relevant to the Nova Scotia situation.

A series of 43 recommendations, grouped according to the following categories is presented in the report: policy issues; process/contractual issues; management; governance; accountability; management information systems; programme and funding/financial. The rationales for each recommendation are included.

In conclusion, the findings of this audit have raised serious concerns and many important overarching issues associated with the Department of Medicine AFP. AFPs constitute an important policy and funding instrument for the provision of academic specialist services, with important benefits for the health care system. However, for improved efficiency and

effectiveness, as well as system-wide coordination, the objectives and expected results of the AFP must be coherently established from the outset, and be better aligned with DOH policy directions. It is clear that AFPs need to be supported by strong governance, managerial, administrative and financial systems, and these require a commitment of resources to effectively implement. Measures for the strengthening of AFPs, and specifically, the DOM AFP, have been presented in this report, with the intention of improving the design, operations and evaluation of this important component of the Nova Scotia health care system.

ACKNOWLEDGMENTS

The audit team wishes to extend its sincere appreciation to all those who participated in this review process. The time, insights and candor of all respondents, both Nova Scotian and from other provinces and territories, were highly appreciated, and have been instrumental in providing for results which will hopefully contribute to the enhancement of alternative funding plans in Nova Scotia.

Audit team members included Martine Durier-Copp; Harold Dunstan; Neil Roberts; Camille Gallant*; Rosslyn Ernst; and Jacqueline Ouellet.

* Camille Gallant passed away prior to the completion of the study. The team members wish to acknowledge his important contribution to this assignment.

Acronyms and Definitions

Acronyms

ABCC	Atlantic Blue Cross Corporation
AFA	Alternative Funding Agreement
AFI	Alternative Funding Initiative
AFP	Alternative Funding Plan
APP	Alternative Payment Plan
AHSC	Academic Health Science Centre
CDHA	Capital District Health Authority
CIHI	Canadian Institute for Health Information
DOH	Department of Health (Nova Scotia)
DOM	Department of Medicine
FFS	Fee for Service
FOM	Faculty of Medicine (Dalhousie University)
FTE	Full Time Equivalent
HHR	Health Human Resources
MAF	Management Accountability Framework
MSI	Medical Services Insurance
MSNS	Medical Society of Nova Scotia (Doctors Nova Scotia)
MSU	Medical Service Unit
NSG	North South Group Incorporated
RBM	Results Based Management
VFM	Value for Money

Definitions[1]

Alternative payment modes are alternatives to fee for service used to pay physicians.

Alternative payment plans (APP) refer to actual arrangements to pay physicians by alternative modes. Salaried physicians in underserviced areas would be an example of an alternative payment plan.

Alternative funding refers to methods other than fee-for-service used to fund clinical departments (e.g. practice plans or academic medical centers) or specific programs. The agency that receives the funding is responsible for determining the nature and amount of payment to individual physicians.

Clinical services include medical care provided by all specialties except radiology and pathology.

Alternative clinical refers to all payments made for clinical services provided by physicians and not reimbursed on a fee-for service basis. Classifications vary across jurisdictions, and may include: salary, sessional, capitation, block funding, contract and blended, Northern and underserviced areas, emergency and on call.

Non clinical payments may include rural incentives, payment for hospital based physicians and benefits.

Shadow billing is an administrative process whereby physicians submit service provision information using provincial/territorial fee codes. However, payment is not directly linked to the services reported. Shadow billing data can be used to maintain historical measures of service provision based on fee-for service claims data.

[1] Drawn from CIHI, ***The Status of Alternative Payment Programs for Physicians in Canada, 2004***

PREAMBLE

Overall, the findings of the Audit process have demonstrated that the Department of Medicine (DOM) Alternative Funding Plan (AFP) has yielded many important benefits for Nova Scotia's health care system. Major difficulties experienced by DOM with respect to recruitment and retention of medical specialists have been effectively addressed. The academic program at the DOM is seen to have been strengthened under the AFP, and it is generally reported that clinical care is now being provided in a more rational and responsive manner, where acuity and appropriateness of care take precedence over volume, as was sometimes experienced under a FFS system.

Some specialists in the DOM are of the opinion that, without the AFP, the DOM, and several of its subspecialty divisions, may not have survived due to the established practice of certain divisions within DOM subsidizing others, as a result of the manner in which the overall medical fee structure had been designed and practice plans managed. The AFP has assisted in resolving many of these internal tensions, and has resulted in a system where stability and security have been promoted at the region's main tertiary and quaternary institution.

There was consistent favorable comment regarding the Department of Medicine's ability to work in a much more integrated manner, to appropriately delegate work to non-physicians, in a manner not possible under the incentives of a fee-for-service system. The inclusion of clinical nurse specialists, physician extenders, and alternative providers in the health care team is seen to be a positive development in team-based care delivery and integrated care. With the removal of pressure to maximize patient volumes, a coherent triage system has been designed and implemented throughout the DOM divisions, with standards for prioritizing patients based on acuity, and with standard wait times assigned to each category. The AFP is considered to have contributed significantly to the development of this triage system and to the collaborative teamwork approach which it promotes.

The AFP is considered by some of its major stakeholders as a vehicle for achieving the required balance between health care delivery and the requirements of an academic mandate. It is considered to promote more patient oriented environment than fee-for-service, enables clinical teaching and health promotion/disease prevention to enter the service equation, and generally enables physicians to be more participatory in the health system planning and decision-making process.

The AFP is also seen to have contributed to a more balanced and reasonable lifestyle for academic specialists, resulting in a healthier and more sustainable workforce, better able to engage in a broad range of clinical and academic activities.

In general, the project team strongly supports DOH moving towards the implementation and management of Alternative Funding Plans (AFP) for university-based medical specialists[2], as a replacement for the traditional Fee for Service system. A well-designed and managed AFP has many positive features and system-wide implications for health care and medical education. Policy makers and health care managers across the country have come to understand that a FFS system is not compatible with the objectives and operational realities of academic health sciences centres.

The general consensus about the rationale for the adoption of AFPs as a funding mechanism includes the following policy objectives:

- Assisting in the recruitment and retention of academic specialists;
- Stabilisation of specialist care and education in undergraduate/postgraduate/ continuing professional development;
- Changes in physician incentives, leading to new patterns of clinical practice, more appropriate care, and increased time for research and teaching; and,
- Provision for predictability of expenditures and rational health human resource planning (physician/nursing/allied), as well as more coherent use/introduction of health care technologies.

Survey and interview findings of this audit process showed that quality of care under the DOM AFP was rated very highly by all respondents, and the collaborative nature of care delivery was commended. Clinical teaching was favourably reviewed, with more time being provided to residents and more opportunities for their participation in research activities. Further, the team found that the AFP has allowed for more collaborative initiatives involving the DOM specialists working with colleagues in other Divisions and in other parts of the province.

In terms of the academic component of the AFP, the team's assessment of the teaching activities of the department is that the size of the program has grown over the past few years, the scheduling of academic responsibilities is thorough and comprehensive, and a system of performance measurement utilized by each Division head is in place. Respondents also reported that the AFP contributed to the "survival" of research programs within the DOM. Research within DOM represents the largest research component within the Faculty of Medicine and is a major area of examination by the Royal College of Physicians and Surgeons. Accordingly, this is an important consideration in terms of evaluating the AFP.

However, apart from the benefits cited above, several major areas of weakness also emerged in the project team's analysis of the DOM AFP. The audit process was necessarily guided by the contractual instruments which had been agreed to by the parties. In that connection, the AFP Contract and Annexes, and the agreements contained therein were to form the basis for the audit process.

[2] The DOM AFP includes funding for 4.5 FTE GPs

Accordingly, the audit team was faced with performing the audit of the Department of Medicine AFP with two major provisions in mind:

- The AFP Contract stated that deliverables would be developed by the parties, and failing the development of deliverables, directed that the evaluation of the AFP was to be conducted on the basis of shadow billing (section 6.6); and,

- The AFP was to identify, under Article 3.1.2 of the AFP contract, what portion of the Minister's funding was to be allocated as a Special Increment for Teaching.

As the parties to the AFP did not agree on deliverables and as no identification of the Special Increment for Teaching was proposed, the AFP would have to be evaluated using shadow billing data against the total Minister's funding, under Article 3.0 of the AFP.

Given the fact that the evaluation measurement criterion mandated by the AFP contract was exclusively limited to the analysis of shadow billing data to measure DOM performance, and in light of its analysis of shadow billings information, the project team cannot conclude that the AFP has offered the Province Value for Money.

However, the audit did not ignore the objectives and intent of the AFP, as the project team understood them. That intent is adequately spelled out in the Preamble to the AFP which states, in part:

> "….the members of the Department of Medicine for the District collectively carry out a unique and special combination of clinical, teaching, research and administrative activities for which a system of payment other than fee for service is appropriate;"

Based on this concept and direction, the project team approached the audit with a broader and more comprehensive perspective which involved a value for money analysis for the activities performed under the AFP. In an attempt to fully assess VFM, the team analysed shadow billing data in depth, and went further to examine other sources of pertinent information relating to the performance of the AFP. It adopted a comprehensive economy/efficiency/effectiveness framework to examine DOM AFP activities. In reporting its findings to the Department of Health and responding to the mandate of this audit assignment, i.e. a Value for Money Audit, the project team has been unable to provide an unequivocal positive or negative answer. While it is evident that the DOM has continued to provide high quality clinical services through its 16 divisions funded by the AFP, which clearly respond to health care needs of the province and region, and to carry out its educational, research and administrative activities, what is less clear is whether the province has obtained value for money for the Minister's funding of $31.5Million annually for the DOM AFP, totaling $82.8M over the AFP contract period, as compared with the services which would have been provided under the FFS payment mechanism. Without the clear articulation of specific AFP deliverables, performance targets or measurable indicators, the economy, efficiency, and the effectiveness of the DOM AFP arrangement cannot be accurately

analysed, measured nor reported on. Where conclusions can be drawn, these have been presented in this Report; where information is lacking, these gaps have been identified to guide the design and development of future AFPs.

As this Audit has demonstrated, AFPs have emerged across the country as a preferred management and payment system for academic physicians. Most Canadian provinces have introduced some variety of "alternative funding", in an effort to move away from the FFS physician remuneration system. However, the administrative infrastructure to effectively manage, monitor and evaluate AFP performance is still in a state of evolution, as departments of health in most jurisdictions attempt to design appropriate accountability frameworks and the requisite information systems to capture information relating to AFPs. In this sense, all major participants in the AFPs are developing and building capacity to effectively manage these new operational systems.

The audit team has approached its review of the DOM AFP with a view to assisting in the development of the management capacity of all AFP partners to effectively plan, administer and evaluate future AFPs.

In terms of stakeholder perceptions of the AFP, based on the audit team's interviews, meetings, and survey responses, conflicting views of the performance of the DOM AFP have been reported.

The majority of respondents from the DOM, the CDHA, and Dalhousie Faculty of Medicine interviewed or surveyed as part of this audit process have supported the AFP concept, stating that it is achieving its objectives, and represents a "vast improvement" over the FFS system. Clinical Division heads have, almost unanimously, reported that recruitment at the DOM has been enhanced – some divisions, for the first time, are at full complement – resignations for financial reasons have virtually disappeared, and, as reported to the team, residents in the academic programs are now more interested in remaining in the province than in the past.

Furthermore, these respondents reported to the project team that the DOM physicians were practicing "more appropriate" and "better" medicine; that the "territorial" aspect of divisional "turf" had diminished; that an effective triage system to rationalize specialist services had been introduced and implemented; and that team-based delivery was being utilized, with redefined roles for support health professionals, such as clinical nurse specialists, and physician extenders. Academic and research components were said to have benefited from the AFP. As such, all of these reported benefits provided by the DOM AFP clearly support the DOH goals of:

- Better integration of services;
- More appropriate care at all levels; and,
- Provision of the full continuum of care services, and the full range of services, from health promotion to quaternary care. [***DOH Business plans, 2003.2002***]

From the perspective of the survey of DOM patients, there was no discernible difference in their perception of care as provided by specialists, pre and post AFP, with the exception of longer waiting times being identified by some respondents. The majority of patients rated quality of care, as provided by DOM specialists, very highly.

However, from the perspective of those outside of the AFP system, concerns were expressed. The majority of family doctors surveyed, as well as specialists not included in the AFP, when asked to compare access to clinical care provided by DOM physicians pre- and post-AFP, described access as being "moderately" to "significantly" reduced. Communications, access, and professional relationships were described as "poor" to "very poor", and it was emphasized that continuity of care between the family doctors and specialists was being compromised.

Moreover, the project team identified many serious administrative weaknesses both in the development and in the implementation of the AFP. These include the following: the negotiation process; communication and inter-relationships among the parties; compliance issues; controls; management and accountability; reporting and shadow billing issues; overpayment based on actual FTEs; duplicate benefits; unclear policies relating to payments to part-time physicians; absence of deliverables; lack of reliable information and/or reporting systems; subsidization of the Dalhousie Medical School through the AFP; lack of coherence concerning overhead allocations; absence of required resources at DOH to effectively manage the AFP; and many others.

To its credit, the DOM has adopted several important initiatives to provide for quality of care, to effectively manage and monitor AFP performance, and to assess DOM productivity. Many of these initiatives were developed unilaterally by DOM in the absence of overall direction and focus provided by DOH or CDHA. These must be highlighted and applauded, and include the triage system, standards for wait times, reporting systems, and others.

It is also recognized that the frustration expressed by many primary care providers concerning access and wait time issues, are related to system-wide issues which frequently fall outside of the control of the DOM. However, care must be exercised, in the interests of coordination and integration of services across the various levels of care, that the DOM does not contribute to fragmentation and that its objectives and operational standards be clearly communicated system-wide.

This Report details the Audit findings, and puts forward recommendations to address the design, management and implementation of AFPs. Many remedial measures need to be immediately adopted in the management of this, as well as other, AFPs. Some of these measures are proposed below and will require a collegial and concerted effort by the principal stakeholders in the AFP process – DOH, Dalhousie University, DOM, CDHA, MSNS, - to work together so as to make the AFP program and process more effective, as well as more transparent and accountable to the public for the resources expended.

1.0 INTRODUCTION

1.1 GENERAL COMMENTS

Alternative funding plans were introduced in Nova Scotia as innovative funding mechanisms to respond to specific challenges associated with the provision of specialist medical services. AFPs were first introduced in the mid-nineties, and consume a growing proportion of the Medical Services Insurance budget of the Nova Scotia Department of Health. Trends indicate continued growth of AFPs in the near to medium term in this province. Alternative funding mechanisms have been increasingly adopted across the country, as provincial governments realize that the fee-for service system does not constitute the optimal funding mechanism to effectively manage academic specialists.

A major disadvantage of the FFS system relates to the fact that productivity is represented by the units of service and procedures performed, rather than the appropriateness or quality of the outcome. The FFS system has also been associated with physician-induced supply, and the provision of procedure-intensive health care. Other drawbacks include the common practice in university clinical departments of subsidizing academic activities through the generation of FFS-based income. In academic settings, physicians have often formed self-directed contribution plans to support teaching and research activities.

AFPs have been introduced in an effort to address some of these concerns and to counteract the tensions created by FFS subsidization of practice plans to support teaching and research activities. In general, AFPs are considered a significant alternative to FFS billings, in enabling academic physicians to engage in a balance of clinical, teaching, research and administrative functions.

Despite these benefits, the introduction and administration of AFPs have posed daunting challenges for provincial health managers.

Management of academic health sciences centers, such the CDHA/Dalhousie Department of Medicine, is a complex undertaking, involving multifaceted operations and numerous diverse stakeholders. Academic health science centers involve:

- Multiple, often conflicting, roles and three-pronged missions – patient care, research, teaching;
- Governance and authority structures that are affected by regionalisation of health care system;
- Multiple reporting relationships, matrix organizational structures, and employee and non-employee relationships; and,

- Evolving patterns of delivery of health care and rapid advances in health care technologies.

Funding for academic health sciences centers flows from various streams, including two separate governmental departments (Education and Health), university, federal and provincial grants, regional health authority, industry research funds, and other sources.

As a new payment mechanism and "program", AFPs require new models of management. The introduction of AFPs has not been supported by the design of clear objectives, well articulated deliverables, nor by the requisite information, reporting or evaluation frameworks. In most cases, the evaluation methods utilized to assess AFP performance have been comparisons with shadow billings based on the traditional FFS system, which can create interpretations of productivity which do not reflect the changes in practice which AFPs were created to promote.

To this date, AFPs have not benefited from comprehensive evaluations, which could provide valuable information regarding their implementation and impact on the health care system. However, in 2000, the Nova Scotia Auditor General's Report identified weaknesses in the management of AFPs, and recommended remedial action [***Report of the Auditor General, 2000***]. These dealt specifically with the requirement for specific outcomes; with the need for increased controls and monitoring; with financial management. These issues were highlighted once again in the 2003 Report [***Nova Scotia, Report of the Auditor General, 2003, sections 9.10-9.28***]. DOH has indicated action taken to address the areas of concern.

The current review is a Financial Audit, Value for Money Audit, and Process Evaluation relating to the management of the DOM AFP, the largest AFP in Nova Scotia. The findings of this audit process have highlighted several overarching issues associated with AFPs:

- AFPs are an important policy and funding instrument for the management of academic medical specialists, with important benefits for the health care system;

- For improved efficiency and effectiveness, as well as system wide coordination, policy and program objectives for the AFPs must be coherently established from the outset, and be aligned with DOH overall direction. Lack of clear direction can result in ambiguities and misunderstandings with respect to the goals and expectations of the DOM AFP;

- AFPs must be supported by strong governance, managerial, financial and administrative systems, which are prerequisites for the efficient and effective operations of programs of this scope. These relate to DOH resources, information systems to capture relevant data; meaningful partnership of the signatories in AFP management, required controls and balances, effective financial administration, and other measures, which will be discussed in this report; and,

- AFPs must include concrete, quantifiable and agreed upon deliverables to enable AFP performance and productivity to be evaluated.

Measures are proposed throughout this report for the enhanced management and administration of AFPs. Due to the limitations circumscribed by the scope of this assignment (Financial/VFM Audit/Evaluation of contract management), the clinical and health-related impact of the DOM AFP was not examined. The project team strongly recommends that an impact evaluation be undertaken, to address key questions relating to the results of the AFP on the performance of the health care system, and on health outcomes.

1.2 DESCRIPTION OF AUDIT MANDATE AND SCOPE

The Nova Scotia Department of Health contracted with North South Group (NSG) to undertake an Audit of the Department of Medicine Alternative Funding Plan. The scope of the contract assignment is laid out in Schedule A1 of the Contract which was signed by the parties on June 15, 2004.

As described in the contract with North South Group, the mandate of the assignment was as follows:

- Perform a financial audit of the funds provided under the Department of Medicine AFP over the past three fiscal years;
- Perform a value for money audit on the operations of the Department of Medicine;
- Provide an analysis and evaluation of contract management and implementation processes and recommend any suggestions for improvement;
- Provide an analysis of performance evaluation and any recommendations for improvement; and,
- Final audit report on the findings under both Financial and Value for Money Audit.

1.3 GENERAL APPROACH AND ACTIVITIES

The audit team held a project initiation meeting with the Client Authority, represented by Ms. Jane Breckenridge and Ms. Linda Penny, of Physician Services, DOH, wherein the scope and objectives of the project were reviewed and confirmed. The information needs of the team were discussed, and a documentation list developed.

Project activities were divided into three broad, interconnected, components:

1. Financial Audit of DOM AFP (2001, 2002, 2003);
2. Value for Money Audit; and,
3. Evaluation.

An introductory meeting with the principal stakeholders was held on June 22, 2004, wherein all the parties met and exchanged perspectives on the scope of the review; key issues were raised and discussed. Likewise, introductory meetings were scheduled, and held, with all principal stakeholders of the AFP, to obtain perspectives and gather information required by the review/audit. Documentation was gathered, catalogued, and analysed by team members. The list of respondents interviewed in person by the audit team is included as Appendix A.

Reports to the Client Authority were presented on a bi-weekly basis, describing objectives for the work period, activities, key findings or critical issues, and deliverables.

The first stage of activities involved the Financial Audit of the DOM AFP. A Financial Audit Plan was presented to DOH for approval, upon which the audit process was initiated. The team undertook a comprehensive review of financial processes, documentation and reports. The Financial Audit Report is included as Section 4.1 of the Report.

Furthermore, a Value for Money (VFM) Audit Framework was developed by the Project Team, which detailed research objectives, information sources and research instruments. The VFM Audit Framework was presented to the Client Authority for approval, and was also discussed with all AFP principal stakeholders on August 9, 2004.

As the team continued its analysis and meetings, "critical issues" and limitations emerged, which required discussion with the Client Authority with respect to their impact on the audit and evaluation processes. These included:

- Lack of specifications regarding AFP contract deliverables, to be used as a basis for VFM audit and evaluation analyses;
- Weak information base for VFM audit analysis (to be used in before and after comparisons);
- Lack of pre-AFP data for many research areas, which carried into the AFP implementation phase;
- Lack of clarity on shadow billing, with respect to accuracy and completeness of information available from ABCC;
- Lack of "comparability of data" related to before and after AFP;
- Lack of a clear policy decision on shadow billing at DOH; and,
- Ambiguities with respect to definition of FTEs, 90 day vacancy clause, and other provisions in the AFP contract.

In discussions with the Client Authority at DOH, the project team pointed to the lack of reliability of shadow billing information, which would have an impact on the accuracy of the information collected for the VFM audit. Shadow billings were not submitted to the same audit process at ABCC as regular FFS billings. It was therefore recommended by the team, and

approved by DOH, that ABCC would immediately conduct an audit of the DOM shadow billings, so as to provide a more reliable base of information to conduct the data analysis. The impact of this additional activity on the original project schedule was discussed, but the importance of this measure to provide for a more reliable base of information for analysis, was agreed upon by all.

The Financial Audit Report of the DOM AFP for the years 2001, 2002, 2003 was provided to the DOH on August 11, 2004.

The audit team subsequently developed the draft Evaluation Plan and Framework, which comprised its third major phase of activities for the Audit process. This Evaluation Framework was submitted to DOH for review and approval. The Framework included evaluations questions, reach, audiences and instruments.

Project activities were disrupted in August 2004 due to the sudden death of Camille Gallant, Senior Associate at North South Group and Project Auditor. The team reallocated work assignment responsibilities internally to complete the requirements of the project.

Project interviews, documentation and data review and analyses continued intensively during September to November 2004, during which time over 40 meetings and interviews were held with principal stakeholders, including all 16 division heads at DOM, in an effort to analyse the impact of the AFA on DOM clinical, academic and research activities.

The VFM component also included a survey of multiple respondent groups so as to gain a better understanding of how the AFP was seen to have affected quality of patient care, volume of care, access to specialist services, clinical teaching, research and administration activities, as well as other AFP related undertakings. The survey involved the design and development of 11 sets of survey questionnaires for the 11 identified audiences, together with the compilation of the key respondent lists and mailing addresses. The list of questions and audiences were submitted to DOH for review and approval. An introductory letter was sent to all respondents, advising them of the survey and requesting their participation. A detailed description of the methodology for the survey is provided in Section 4.2.3.1 of this report.

Concurrently, the Evaluation Framework was completed, and evaluation interviews undertaken with all major AFP stakeholders to assess the AFP contract management process and control systems. The evaluation component of this audit including the methodology is described in Section 4.3 of this report.

Furthermore, an inter-provincial comparison of AFPs was conducted by the project team as a component of the review. This involved telephone interviews with provincial/territorial Departments of Health, to gather data on the management of AFPs in other provinces with relevance to the DOM AFP, and to highlight common issues of relevance to Nova Scotia.

On October 18, 2004, ABCC completed its audit of shadow billings. Following the presentation of findings by ABCC to DOH and NSG, the team began its analysis of shadow billings data so as to draw out pre- and post AFP comparisons.

Data gathered from the VFM audit components and from the evaluation interviews were compiled and analysed by the project team, and a series of recommendations developed. These were presented, in draft form, to the Client Authority at DOH on December 1, 2004, as well as to a general meeting of the DOM AFP stakeholders, on December 13, 2004.

The AFP DOM Final Report was submitted to the DOH Client Authority on December 15, 2004 presenting the audit team's analysis, findings, and series of recommendations. It is hoped that the recommendations provided herein will contribute to the enhanced management of alternative funding plans in Nova Scotia, resulting in quality and cost-effective health services for Nova Scotians.

2.0 BACKGROUND

2.1 BACKGROUND ON AFPS TRENDS AND ISSUES IN CANADA

Alternative payments in Canada increased by approximately 40% during the years 2001-2002; these amounted to some $1.8 billion or 16.2% of the value of medical services in the eleven provinces and territories surveyed. There was considerable variation across the jurisdictions, however, from a low of 4.7% in the Yukon to 38.9% in Newfoundland/Labrador (figures for Nunavut and the NWT were not reported in the CIHI data).[3]

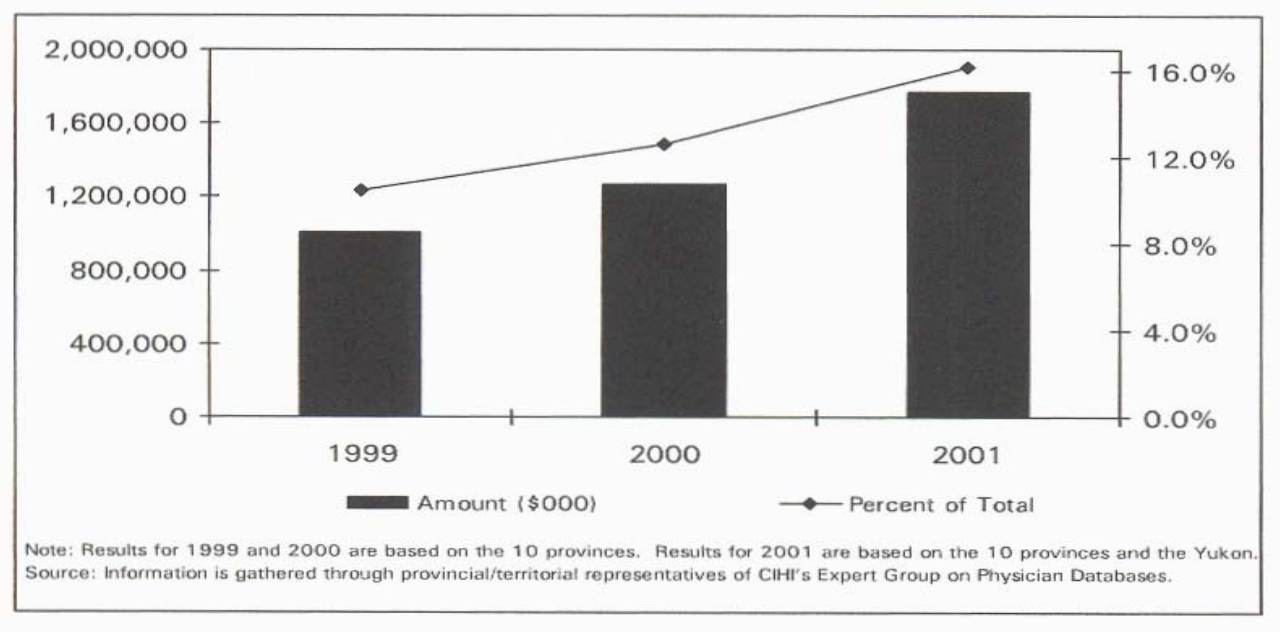
The percentage of physicians funded through AFPs ranged from 4.4% in Alberta to 53.5% in Québec. Québec has the highest number of physicians whose main source of remuneration is through AFPs. AFPs increased by approximately 40% during the 2000-01 period (Figure 1).

Full time equivalents (FTEs) funded through AFPs constitute 11.3% of the total medical workforce. Nova Scotia has the highest percentage of FTEs on AFPs at 28.5%.

Newfoundland/Labrador, Manitoba and Nova Scotia, respectively, have the three highest percentages of physicians on alternative payment systems (Figure 2).

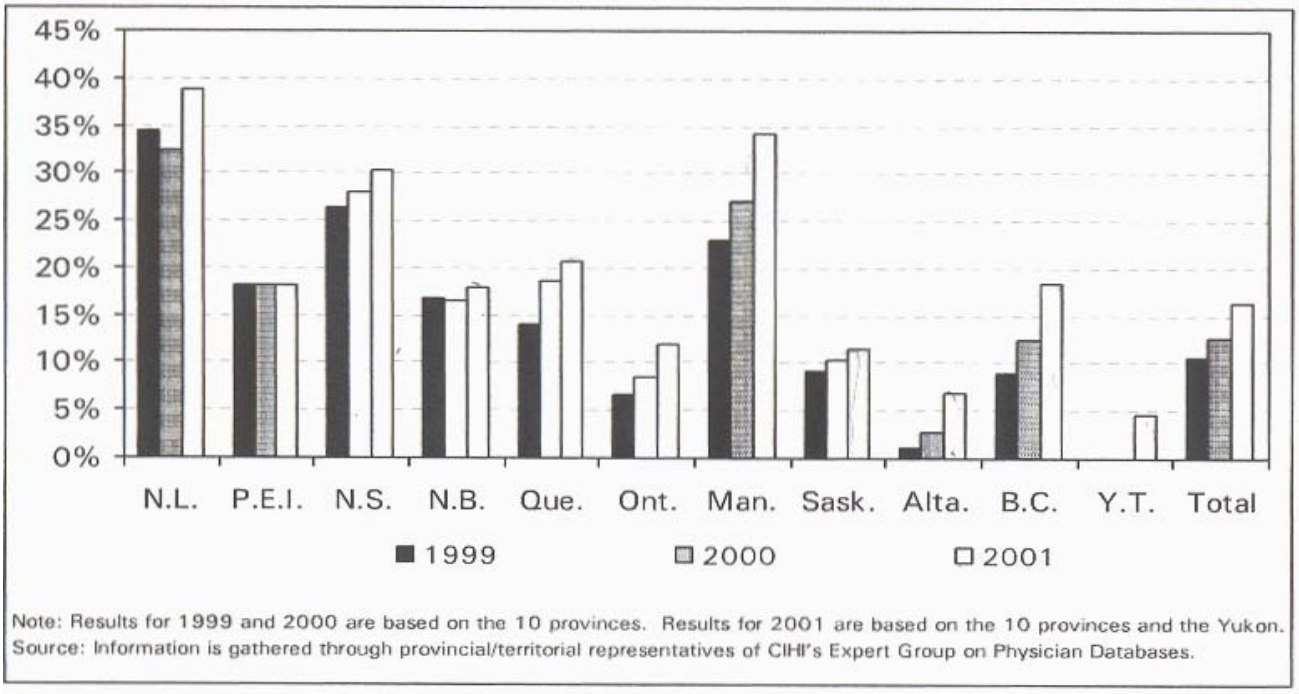
[3] [Sources: ***Alternative Payments and the National Physician Database (NPDB)*** ***The Status of Alternative Payment Programs for Physicians in Canada***, **2001-2002**, and ***Preliminary Information for 2002-2003, Canadian Institute for Health Information,*** **2004**]

Figure 1 Physicians' Alternative Clinical Payments, 1999-2000, to 2001-2002



Note: Results for 1999 and 2000 are based on the 10 provinces. Results for 2001 are based on the 10 provinces and the Yukon.
Source: Information is gathered through provincial/territorial representatives of CIHI's Expert Group on Physician Databases.

Figure 2 Physicians' Alternative Clinical Payments as a Percentage of Total Clinical Payments, 1999, 2000 and 2001



Note: Results for 1999 and 2000 are based on the 10 provinces. Results for 2001 are based on the 10 provinces and the Yukon.
Source: Information is gathered through provincial/territorial representatives of CIHI's Expert Group on Physician Databases.

Arrangements throughout the Canadian jurisdictions vary extensively; for example, several provinces include AFPs for emergency services or for rural physicians. In some provinces, (e.g. Manitoba), AFPs are used to top-up FFS billings in emergency services, while they replace FFS billings in rural areas. In New Brunswick, special on-call premiums supplement regular payments for emergency services (which are funded through AFPs). In Saskatchewan, rural on-call activities are funded primarily through FFS payments.

Table 1 shows the breakdown between FFS and Alternative Funding Systems for all Canadian provinces. Nova Scotia reports that in 1999-2000, 72% of payments (or $224,907,000) were paid through FFS system, while 27.3% or $84,280,000 though AFPs. In 2004-05, however, those figures had changed to 60.2% (or $252,760,000) for FFS and 39.8% through AFP (or $166,865,600), for total MSI expenditures of $419,625,600.

Table 2 depicts the estimated AFPs by type of payment, for each province and the Yukon Territories.

The proportion of physicians paid through AFPs varies across the country, with Québec reporting over 53% of its medical workforce being paid through alternative remuneration systems. It must also be pointed out that many physicians who are paid through AFPs also bill under the FFS system. Table 3 depicts the total number of physicians per province, as well as the number and percentage, who receive alternative payments. Thus, for Nova Scotia, it can be seen that for the 2,003 physicians active in the province in 2001-2002, 64.3 % were paid through alternative modes, and of those, 21% were paid mainly through AFPs[4] . Thus, PEI, at 30%, Nova Scotia at 21.1% and Québec at 23.4%, respectively, reported the highest percentages in the country.

Likewise, physicians working in alternative payment systems across the country numbered approximately 5,695 FTEs (see Table 4). Thus, Nova Scotia reported that of its total physician cohort of 1,460, 28.5% were paid through an AFP.

Provinces vary in their approaches to tracking services provided under AFPs. Some provinces use shadow billing (using the established FFS MSI fee service codes), these include Québec, Nova Scotia and New Brunswick, while others use some variation of FFS shadow billing. Others, like Newfoundland and Ontario (for certain APPs), do not use shadow billing.

In conclusion, as this Section has shown, there has been increased use across the country of alternative payment plans, with many provinces still utilizing shadow billing to monitor and report on AFP performance and productivity.

[4] the number for whom at least 50% of all clinical income was derived through alternative funding

Table 1 Summary of Physician Payments by Type of Payment and Province/Territory, Fiscal 1999-2000 to 2002-2003 ($'000)

1999–2000											
	N.L.	P.E.I.	N.S.	N.B.	Que.	Ont.	Man.	Sask.	Alta.	B.C.	Total
Fee-for-Service[1]	100,430	26,163	224,907	170,264	1,710,764	3,733,473	241,444	244,093	829,127	1,248,857	8,529,521
	66.6%	81.9%	72.7%	83.4%	85.1%	93.1%	73.8%	90.4%	98.7%	90.5%	89.5%
Alternative Clinical	50,384	5,780	84,280	33,798	298,624	277,824	85,626	25,796	10,900	131,200	1,002,624
	33.4%	18.1%	27.3%	16.6%	14.9%	6.9%	26.2%	9.6%	1.3%	9.5%	10.5%
Sub-Total Clinical	150,813	31,943	309,187	204,062	2,009,387	4,011,297	327,070	269,889	840,027	1,380,057	9,532,145

2000–2001											
	N.L.	P.E.I.	N.S.	N.B.	Que.	Ont.	Man.	Sask.	Alta.	B.C.	Total
Fee-for-Service[1]	98,768	26,079	229,387	168,520	1,749,950	3,829,225	272,815	248,969	881,313	1,269,594	8,774,619
	67.7%	81.9%	72.1%	83.5%	81.5%	91.5%	72.9%	89.6%	97.2%	87.5%	87.4%
Alternative Clinical	47,201	5,761	88,855	33,314	398,162	355,674	101,320	29,024	25,214	181,122	1,267,486
	32.3%	18.1%	27.9%	16.5%	18.5%	8.5%	27.1%	10.4%	2.8%	12.5%	12.6%
Sub-Total Clinical	145,968	31,840	318,243	201,834	2,148,112	4,184,900	374,135	277,993	906,527	1,450,716	10,042,105

2001–2002												
	N.L.	P.E.I.	N.S.	N.B.	Que.	Ont.	Man.	Sask.	Alta.	B.C.	Y.T.	Total
Fee-for-Service	96,776	26,711	230,082	185,818	1,838,989	3,911,314	289,705	266,775	975,426	1,303,825	7,687	9,133,109
	61.1%	81.9%	69.8%	82.0%	79.2%	88.1%	65.8%	88.5%	93.2%	81.6%	95.3%	83.8%
Alternative Clinical	61,498	5,901	99,514	40,813	482,322	530,484	150,523	34,665	70,871	294,132	379	1,771,101
	38.9%	18.1%	30.2%	18.0%	20.8%	11.9%	34.2%	11.5%	6.8%	18.4%	4.7%	16.2%
Sub-Total Clinical	158,274	32,612	329,595	226,631	2,321,311	4,441,798	440,228	301,441	1,046,297	1,597,957	8,066	10,904,209

Please see footnotes at end of table

2002–2003 (preliminary estimates)[2]												
	N.L.	P.E.I.	N.S.	N.B.	Que.	Ont.	Man.	Sask.	Alta.	B.C.	Y.T.	Total
Alternative Clinical	64,617	8,705	113,798	46,816	528,424	550,442	167,687	42,321	105,287	345,880	771	1,978,942

[1] Fee-for-service payments for 1999–2001 and 2000–2001 presented in this report update fee-for-service payment information presented in previous Alternative Payments and the National Physician Database reports.
[2] Preliminary fee-for-service payment estimates based on the NPDB are not available for 2002–2003 at the time of writing.

Sources : Fee-for-service NPDB payments are based on data submitted to the National Physician Database, CIHI; Alternative clinical payment information is gathered through provincial/territorial representatives of CIHI's Expert Group on Physician Databases, with the exception of Newfoundland and Labrador, Manitoba and Ontario in 2001–2002 and 2002–2003. Alternative clinical payment information for Newfoundland and Labrador, Manitoba and Ontario were obtained from public accounts and estimates compiled in the CIHI National Health Expenditures Database for 2001–2002 and 2002–2003. The data are preliminary and subject to change.

Table 2 Estimated Alternative Clinical Payments by Type of Payment and Province/Territory, Fiscal 2001-2002 ($'000)

	N.L.	P.E.I.	N.S.	N.B.	Que.	Ont.	Man.	Sask.	Alta.	B.C.	Y.T.	Total
Salary	52,282	3,868	10,967	16,541	68,496					8,769		160,923
Sessional	9,216		1,561	22,225	184,494					50,977		268,473
Capitation												
Block Funding			48,550					4,857				53,407
Psychiatry			14,534									14,534
Blended		2,033			229,331	19,427				5,024		255,816
Northern and Underserviced Areas				2,047		19,947		3,014		33,523		58,530
Emergency and On Call			23,901					10,233	50,177	110,454		194,765
Contracted/Unspecified						491,110	150,523	16,562	20,694	85,385	379	764,653
Total	61,498	5,901	99,514	40,813	482,322	530,484	150,523	34,665	70,871	294,132	379	1,771,101

Notes: Blended includes a special program of blended remuneration in Quebec for specialists introduced at the end of 1999. Funding to regional boards for hospital-based programs (including emergency services) in Prince Edward Island, Manitoba and Saskatchewan.
Contract and Unspecified includes:

- Service Agreements in British Columbia.
- Payments that were not broken down, e.g. Ontario, which has block funding and other forms of alternative remuneration.

Missing values indicate either no payments or insufficient detail to break down payments to certain categories.

Sources: Information is gathered through provincial/territorial representatives of CIHI's Expert Group on Physician Databases. CIHI's National Health Expenditures Database was used as a secondary source of information for Newfoundland and Labrador, Manitoba and Ontario. The data are preliminary and subject to change.

Table 3 Total Physicians and Physicians Who Received Alternative Payments, by Province, Fiscal 2001-2002

	Total number of physicians	Number of physicians paid through alternative modes	Percent of total physicians paid through alternative modes	Number of physicians paid mainly through alternative modes	Percent of total physicians paid mainly through alternative modes
N.L.	945				
P.E.I.	190	57	30.0%	57	30.0%
N.S.	2,003	1,287	64.3%	423	21.1%
N.B.	1,488	583	39.2%	100	6.7%
Que.	14,752	7,896	53.5%	3,452	23.4%
Ont.	22,030	3,013	13.7%	387	1.8%
Man.	2,093				
Sask.	1,622	260	16.0%	96	5.9%
Alta.	5,151	227	4.4%	75	1.5%
B.C.	8,234	2,337	28.4%	835	10.1%

Note: The number of physicians reported usually reflects the total number of physicians registered with provincial/territorial medicare plans and may exceed the number actually paid.

Sources: Information is gathered through provincial/territorial representatives of CIHI's Expert Group on Physician Databases. Newfoundland and Labrador, Prince Edward Island and Manitoba did not submit 2001–2002 physician count data. CIHI's Southam Medical Database was used to estimate the total number of physicians in Newfoundland and Labrador, Prince Edward Island and Manitoba. Prince Edward Island physician count data for 2002–2003 was used to estimate alternative payment physician counts for 2001–2002. The data are preliminary and subject to change.

[2] Alternative funding refers to the way in which clinical services were funded by provincial governments, not the way in which physicians were paid individually.

Table 4 Estimated FTEs in Alternative Payment[5], by Province, Fiscal 2001-2002

	Full-Time Equivalent Physicians			Distribution	
	FFS	APP	Total	FFS	APP
N.L.	631	200	831	75.9%	24.1%
P.E.I.	162	63	226	72.0%	28.0%
N.S.	1,044	416	1,460	71.5%	28.5%
N.B.	844	238	1,081	78.0%	22.0%
Que.	10,952	2,239	13,192	83.0%	17.0%
Ont.	18,440	1,250	19,690	93.6%	6.4%
Man.	1,515	394	1,909	79.4%	20.6%
Sask.	1,325	123	1,447	91.5%	8.5%
Alta.	4,207	153	4,360	96.5%	3.5%
B.C.[2]	5,480	618	6,098	89.9%	10.1%
Total	44,600	5,695	50,295	88.7%	11.3%

Note: Fee-for-service is abbreviated as "FFS"; Alternative physician payment programs is abbreviated as "APP".
[1] As described in Box 2, FTE estimates use CIHI's "Full-Time Equivalent Physicians Report, Canada, 2001–2002" and "Average Payment Per Physician Report, Canada, 2001–2002". The relevant data series from these reports are presented in Appendix B, Tables B1 and B2. APP FTEs are estimated from data supplied by the provinces for this report.
[2] British Columbia's 2001–2002 FFS FTE physician estimates are preliminary. These estimates may be updated if British Columbia provides CIHI with retroactive payment information pertaining to services provided in 2001–2002.

2.2 HISTORY OF AFPS IN NOVA SCOTIA

In 1969 Nova Scotia created the Medical Services Insurance (MSI) Plan which funded specific healthcare procedures for Nova Scotia residents. This plan was created in conjunction with the introduction of a universal healthcare system in Canada. Included in the MSI Plan was the payment plan for physician's services.

To facilitate the introduction of the MSI Plan, the Nova Scotia government adopted the Medical Society of Nova Scotia (MSNS) 1967 Fee Schedule which was based on a "average case" and "fair return" system. While adopting the system, the government introduced the fee schedule at the 85 % level based on recommendations by an independent advisory body. The plan was also introduced on the basis of voluntary participation by physicians.

This system of payment has continued, with modifications, to date. The MSNS has been recognized, through statute, as the bargaining agent for physicians in Nova Scotia. Under this system the MSNS periodically negotiates with the Department of Health for revisions to the fee schedule and the introduction of new fees or payment systems.

In addition to the fee for service system Nova Scotia introduced, over ten years ago, contracted alternate forms of payments ranging from block funding initiatives to alternate funding contracts with specific Physician Practice Plans. All of these initiatives have been introduced through negotiations with the MSNS. Many of these initiatives followed the recommendations of the 1989 Nova Scotia Royal Commission on Healthcare relating to the need for an alternative funding system and were introduced to address specific healthcare issues.

In the early 90's, alternate funding was introduced for Public Psychiatry through the introduction of hospital based funded blocks of hours. Also in the early 90's, the first General Practitioner alternate payment contract was introduced whereby the physician overhead was paid to a facility or board while the General Practitioner was paid net of overhead.

A number of these initiatives followed to such groups as the North End Community Health Center and the Dalhousie Department of Family Medicine.

In the mid 90's, the first of the present day alternate funding plans was introduced for the IWK Department of Medical Pediatrics. This contract called for a block funded income, and provided monies for overhead to the practice plan, introduced minimal performance standards, incorporated a form of a physician resource plan and provided for shadow billing. This AFP was introduced to address Medical Pediatric resource recruitment/retention issues and required an infusion of money over the traditional fee for service earnings, although the specific additional amounts were not identified.

In 1996 the first of Rural Incentive contracts was negotiated which provided payments for service and overhead directly to the General Practitioner. Also in 1996, block funding for the then designated Level 1 and 2 emergency departments was introduced.

All of the early initiatives required extra funding over the monies that would have been paid under the traditional fee for service system.

Other alternate funding contracts were introduced, the most germane of which was the alternate funding contract for the Division of Geriatric Medicine within the QEII Department of Medicine. This AFP not only addressed a specific resource recruitment/retention problem but also introduced the concept of funding for academic services.

In 1997 the Master Agreement between the MSNS and the Department of Health was amended to recognize the existing arrangements and to provide for future special arrangements for physician remuneration. This agreement, signed in June, 1997, covered the period April 1, 1997 through to March 31, 2001.

Pursuant to this Master Agreement, the MSNS and the Department of Health, in December, 1997, signed a document entitled "Principles for Negotiating Alternate Funding Contracts"

(Principles Document). This document outlined the principles for establishing an alternate funding contract as well as the procedures to be applied.

The relevant key points of this document were:

- All members of the group must participate;
- The AFP would address not only clinical services, but also academic, research and administrative activities;
- Payment levels to physicians were to be based on agreed upon manpower (sic) levels;
- Payments would typically draw no more resources from the MSI budget than was historically drawn by fee for service billings over the previous one to five fiscal years of funding;
- Funding increases provided by the Department of Health during the term of the AFP would be based on changes to the Medical Service Unit (MSU) as detailed in the 1997 Master Agreement;
- Shadow billing, or an acceptable alternative method, was mandatory; and,
- An evaluation of the alternate funding contract would be performed.

As will be identified in the sections to come, a number of these points would become problematic for the parties during negotiations for the AFPs.

2.3 DOM AFP 1999

At the time of the first AFP the Department of Medicine, as one department of the Dalhousie Faculty of Medicine, was part of the QEII Health Sciences Centre.

In November of 1997, prior to the completion of the "Principles for Negotiating Alternate Funding Contracts" document discussed above, the Department of Medicine submitted to the Department of Health a comprehensive block funding proposal. The Department of Medicine titled its proposal "***Treating Nova Scotia's Tertiary Care Crisis – A Block Funding Proposal for Dalhousie University Department of Medicine***". This proposal framed the funding and resource requirements of the Department of Medicine, as well as outlining the Department of Medicine's Guiding Principles for an Alternate Funding Plan.

Crucial to the success of the Alternate Funding Plan, in the Department of Medicine's view, was that the funding plan should recognize that clinical care, research, education, and non clinical medical activities are each integral parts of the academic practice within an academic health sciences centre.

Also identified as crucial to the success of the proposed Block Funding Plan was the recognition that the then current global budget of the Department of Medicine was inadequate to meet the requirements of the Department of Medicine.

This point is critical since the (at that time yet to be signed) "Principles for Negotiating Alternate Funding Contracts" agreement provided for, among other things, that Alternate Funding Plans "should typically draw no more resources from the Medical Services Insurance budget/allocation than was historically drawn by fee for service billings over the previous one to five fiscal years of funding." The relevance or application of this particular point is debatable inasmuch as the previous years had been subject to individual financial thresholds and global budgets pursuant to the previous Master Agreement between the Province and the MSNS. As a result the historical budget figure was artificial and not necessarily relevant to a meaningful budget/allocation exercise.

The Department of Medicine identified, in its submission, that its proposal would provide remuneration to members similar to the average salaries for their counterparts at the University of Western Ontario.

Negotiations for the new AFP took place over most of 1998 with a variety of Department of Health personnel concluding in a signed contract dated 22 December, 1998 to cover the period January 1, 1999 through March 31, 2001. This expiry date was consistent with the requirement of the Principles for Negotiating Alternate Funding Contracts document to have special funding arrangements terminate at the same time as the Master Agreement.

Authority to conclude the contract appears to have remained solely within the Department of Health. This Audit was not able to locate any documentation indicating that Cabinet or Finance Department approval was sought, nor was a concise document outlining the Department of Health objectives or the funding calculations leading to the final contract identified to the team.

The team was able, however, through discussions with Department of Health personnel involved in the negotiations, to identify the key topics and general funding issues involved in the negotiations. These interviews, coupled with the final document, provided a good perspective on the first AFP.

At the time of submitting the AFP proposal, the Department of Medicine complement was 82.3 physician FTEs. The proposal was for 117 physician FTE's. For these FTEs, the Department of Medicine identified the clinical, teaching, research, and administration allocations which made up the FTEs. These allocations have been the basis of determining the FTE requirements since that time.

The negotiated AFP commenced on January 1, 1999 and continues through to March 31, 2001 which was the term of the then Master Agreement. This term was dictated by the provisions of the Principles Document. Funding Rates and approved FTEs for funding were:

- January 1, 1999 - 98.85 physician FTEs @ $180,641.00 per FTE;
- April 1, 1999 - 109.55 physician FTEs @ $185,687.00 per FTE;
- April 1, 2000 - 112.85 physician FTEs @ $190,733.00 per FTE; and,
- Funding for physicians over the initial 98.85 physicians was dependent on their recruitment.

Department of Health funding for physician resources at the DOM increased from $17,856,362 per annum at the beginning of the AFP to a final $21,524,219 per annum at the end of the AFP, a 20.5% increase over the term of the contract.

A portion of the funding covered an additional 4.55 FTEs through the addition of Medical Oncologists to the Department of Medicine. Although the audit team found no supporting documentation, interviews determined that this initiative was at the request of the Department of Health to address Department of Health strategies at that time.

As well as the commitment for additional funding by the Department of Health, the AFP also provided for a number of "in lieu of funding" commitments by the QEII and a codification of portions of the Dalhousie Faculty of Medicine funding to the Department of Medicine.

The funding provision provided for negotiated rate per FTE and did not differentiate among specialties or between specialties and general practitioners. In fact it does not appear that there were any general practitioners within the Department of Medicine AFP at the time of negotiating the first AFP.

The AFP provided for the Department Head to "warrant" that all physicians would shadow bill on a mandatory basis throughout the term of the AFP. Shadow billing was to be the means of evaluation unless an alternate method of evaluation was agreed upon.

The AFP also provided that the Department Head would "warrant" that no Department Physician would claim for, or accept, payment under MSI. The AFP introduced a concept of a "suspended Billing Number and/or Billing Arrangement" for the term of the AFP.

In August, 2000 three Palliative Care General Practitioners were added to the AFP. While the audit team was not provided with any documentation, interviews and the fact that they were funded by the AFP would support that they were added to the AFP. This addition required a change in the method of payment which introduced the division of Specialist and General Practitioner FTE rates. Over the term of the AFP, the records indicate that the Department of

Health approved funding for an additional 4.0 FTEs over the number that was initially agreed upon.

The addition of Palliative Care as well as approved additional physician FTE resulted in a physician complement on March 31, 2001 of 115.33 Specialist FTEs and 3.0 General Practitioner FTEs

The Auditor General of Nova Scotia

The 2000 Annual Report of the Auditor General of Nova Scotia examined, among other areas, Physician Alternative Funding Initiatives. The Department of Medicine AFP, as well as other funding initiatives, was subject to the audit. The audit identified a number of areas of concern and several weaknesses in the area of financial controls. The Report made a number of specific recommendations:

- New Alternate Funding Initiatives (AFI) should be supported by documented analysis with specific outcomes and comparisons of estimated AFI cost to fee-for-service;
- Controls and monitoring for AFIs should be increased to reduce risk of inaccurate data input and duplicate payments;
- Monitoring on the completeness of shadow billing information was performed on an ad hoc basis and controls were not adequate;
- AFI contract evaluations by DOH should be done more frequently and include evaluation of service delivery methods, stakeholder satisfaction and clinical outcomes as called for in AFI contracts;
- AFI contracts include provisions allowing payments to be reduced after 90 days if the actual service level is less than contract payments. The Department should ensure this provision is being enforced;
- Base funding for AFI contracts is calculated using the highest of the past 3 fee-for-service years. The implication is that on average AFI contracts will cost the Province more than historical fee-for-service;
- Acute care facilities can provide financial incentives to attract medical specialists without informing DOH. This funding is not fully considered when new AFIs are negotiated; and,
- Roles and responsibilities of the Department versus ABCC with respect to AFI contract monitoring should be clarified.

The Department of Health took some steps to address the Auditor Generals concerns but this audit did not find any evidence of a continued monitoring to ensure that the Auditor General's recommendations were incorporated into the daily business cycle of the Department of Health. This audit will further address some of the Auditor General's recommendations and the action, or lack thereof, in the sections to follow.

The Master Agreement - April 1, 2001 – March 31, 2004, and
The Revised "Principles for Negotiating Alternative Funding Contracts" Document

The Province and the MSNS negotiated a new Master Agreement to cover the period April 1, 2001 through to March 31, 2004. Due to non related healthcare issues in Nova Scotia the Master Agreement negotiations were not completed until the fall of 2001 and the agreement was signed in February, 2002.

The Master Agreement provided for fee schedule adjustments retroactive to April 1, 2001 and further provided that existing alternative funding contracts (of which the Department of Medicine was one) would be adjusted by the percentage increase in the Medical Service Unit. This meant that the Department of Medicine AFP would receive the October 1, 2001 increase pursuant to the Master Agreement and any future increase until the AFP was renegotiated or terminated.

The Master Agreement also contemplated a revision of the "Principles for Negotiating Alternative Funding Contracts" document.

The understanding during the Master Agreement negotiations and expressed in the revised "Principles for Negotiating Alternative Funding Contracts" document was that the alternate funding contracts would be limited to clinical funding increases based on changes to the Medical Service Unit as detailed in the Master Agreement and that any additional funding for the alternate funding contract would be linked to FTE increases.

The "Principles for Negotiating Alternative Funding Contracts" document was renegotiated and signed on April 3, 2002. The new document reflected the understandings reached during the Master Agreement negotiations.

3.0 AFPs IN THE CURRENT CONTEXT

3.1 THE 2001 DOM AFP

Due to delays in finalizing the renewal of the Master Agreement between the Department of Health and the MSNS, the administration of the AFP carried on with no change until the Master Agreement negotiations were finalized. At that time, as noted above, the percentage equivalent of changes to the MSU in the Master Agreement were applied to all AFPs with no additional FTEs beyond those authorized to be in place on March 31, 2001.

Following the completion of the Master Agreement negotiations, the Department of Medicine submitted a proposal titled "***Building for Success – Proposal for Renewal of Alternate Funding Plan 2002***". This proposal called for no additional rate increases beyond those in the Master Agreement, no change in the funding formula from the Dalhousie Faculty of Medicine, and no change in the funding formula from the now Capital District Health Authority. The proposal was for a number of additional positions to the Department of Medicine. As well, the proposal indicated that the Department of Medicine would increase the "Faculty Member Revenue Share" to meet physician rates in "comparable academic centres". These increases, if accepted, would have resulted in a Department of Medicine deficit in 2002/2003 of $1.99 million and $3.83 million in 2003/2004. Thus it was expected that negotiations would address the additional resources and the projected deficits. This proposal was within the intent of the revised Principles Document.

"Comparable Academic Centres" for remuneration purposes were identified as Ontario (other than Toronto), Manitoba and Alberta, as opposed to the University of Western Ontario which had been identified in the proposal for the first AFP.

The resulting agreement negotiated by the then Deputy Minister of Health was totally contrary to the Principles Document signed by the Deputy Minister not two months earlier. The agreement provided for funding increases by the Department of Health that were not based on changes to the Medical Service Unit as detailed in the 2001 Master Agreement. More importantly, the resulting agreement resulted in financial increases greater than had been requested by the Department of Medicine. No documentation was identified to substantiate the larger increases.

The audit team found no documentation to indicate that a strategic direction had been considered within the Department of Health or any documents to support that an analysis with specific outcomes and comparisons had been conducted as recommended in the Auditor General's 2000 Annual Report. There was no identified documentation that explains why the negotiations or the resulting settlement were in conflict with the revised Principles Document, particularly in the area of rate adjustments. Interviews conducted by the audit team disclosed that the key portions

of the negotiations were conducted in meetings by the then Deputy Minister of Health with no other departmental staff present and no documentation subsequently provided.

The audit team found correspondence to the then Deputy Minister of Health indicating that the financial parameters as well as other key areas of the AFP had been resolved in June of 2002. However, the final AFP document was not signed until mid-2003 and does not reflect in many areas the intent of the June letter from the MSNS. The only explanation the audit team was able to identify was that this was due to changes in personnel within the Department of Health and the lack of clarity of the settlement achieved by the then Deputy Minister of Health.

In addition to the negotiated increases pursuant to the Master Agreement, the resulting settlement provided for rate increases, as follows:

- October 1, 2001 – 8% rate increase;
- October 1, 2002 – 4 % rate increase; and,
- October 1, 2003 – 4 % rate increase.

The June letter from the MSNS to the Department of Health identified that these "increases in funding are in addition to the 2%, 2%, 2% increases previously negotiated by the Medical Society."

However the Master Agreement provided for increases as follows:

- October 1, 2001 2.12%;
- April 1, 2002 2.07%;
- October 1, 2002 2.03%; and,
- April 1, 2003 1.99%.

For some undocumented reason, the parties chose to apply the increases (to 2 digits) from the Master Agreement with the exception of the April 1, 2002 increase. Why this portion of the increase was not applied is not accounted for in any documentation made available to the audit team. A partial explanation surrounded the application of a 2.15 % GST adjustment to the Medical Service Unit, but even this explanation does not account for an adequate reconciliation of the agreement.

The additional increases were not only contrary to the revised Principles Document but, under the terms of the revised Principle Document, had to be made available to other groups of physicians when new AFP were to be negotiated. The revised Principles Document provided:

> "An alternative funding agreement with one group of physicians must be available to other groups of physicians in substantially the same circumstances…"

There was no documentation identified which would determine what "same circumstances" would mean when applied to other groups. The effect is to increase the cost of other AFPs that were to be renegotiated.

The final AFP also provided for substantial FTE increases in addition to the rate increases:

- April 1, 2002 - 3.25 FTEs;
- July 1, 2002 - 1.0 FTE;
- July 15, 2002 - 1.0 FTE;
- August 6, 2002 - 1.0 FTE; and,
- Contract term - 5.5 additional FTEs.

As well as these increases, the AFP included the addition of 7.5 FTEs in the Division of Geriatric Medicine from its previous AFP effective April 1, 2001.

Further FTEs were added during the life of the AFP.

Notwithstanding the recommendation of the Auditor General in the 2000 Report, the audit team found no documentation that would indicate that, as a result of the new AFP, ABCC was given any additional directions that would have resulted in an increase in the controls and monitoring of the AFP or that the roles and responsibilities of the Department of Health and ABCC were reviewed or clarified.

Authorized FTE Anomalies

The documentation available to the audit team raised some serious questions with respect to the identification and reporting of FTEs.

The first AFP was to result in a final (March 31, 2001) count of 112.85 FTEs. Department of Health documentation established that on March 31, 2001 funding was for 117.75 FTEs which included the now funded Palliative Care General Practitioners. The addition of Geriatric Medicine to the AFP resulted in an additional 7.5 FTEs. The resulting FTE count should have been 125.25 FTEs on April 1, 2001.

Schedule F of the AFP indicates that the base complement (April 1, 2001) for Minister's funding purposes was to be a total of 125.83 FTEs and further identifies that as of April 1, 2002 funding would be provided for an additional 3.25 FTEs previously unfunded under the initial agreement.

The Department of Medicine has identified its complement for April 1, 2001- March 31, 2002 as 123.601. When this number is adjusted to reflect those physicians who are not on complement on April 1, 2001 the result is 114.743 FTEs.

What should be a relatively simple identification of resources is complicated by the fact that the allocation of clinical, teaching, research and administrative time is under constant adjustment by the Department of Medicine administration with the end effect that the tracking of the FTE complement is inordinately complicated – it can be done but the result may not be worth the effort.

Before entering into an examination of the differences between the first and second AFP it is important to note that the audit team found little documentation to indicate that a detailed examination or evaluation of the first AFP had been conducted by the Department of Health. Various economic analyses, measuring shadow billing against either historical fee for service billing information, or of comparative fee for service procedures, had been carried out but the audit team found no comprehensive evaluation of the AFP itself. In addition, as noted above, there was little documentation to show that a strategic analysis of the needs and resulting costs of the second AFP had been conducted.

Differences in the Second AFP

The AFP introduced a number of significant changes from the first AFP.

1. Hospital vs District

Prior to the termination of the first AFP, the QEII Health Sciences Centre became part of the Capital District Health Authority. While on the surface this should not have been an issue, it meant that the definition, as it applied to the jurisdictional area, would become more significant. For example, under the first AFP, each physician was required to sign a declaration that he/she would not claim for or accept payment for MSI with respect to services performed within the QEII. The renewed AFP was to be a District AFP which meant that the provisions should be clear as to exactly where extra billing would be permitted if it were, in fact, to be allowed.

The audit team does not believe that the AFP is clear in this respect nor, based on interviews with ABCC, does it appear that the systems currently in place would protect against such extra billing.

2. Minister's Funding

The second AFP introduced three additional issues not found in the first AFP.

Firstly, in Article 3.1.2, the concept of a "Special Increment for Teaching" (SIFT) was introduced which provided that the Minister had the discretion of determining the amount of SIFT in any year of the agreement. This clause would appear to give the Minister the option of determining what amount of the Department of Health funding would be allocated to the teaching or academic portion of the AFP. This is consistent with the reports of interviews with

both Department of Health and Department of Medicine members who stated that the then Deputy Minister had indicated that a specific portion of the AFP was to fund academic requirements of the Department of Medicine. While there was consistent agreement that this intent had been verbally expressed there was less consistency with respect to the ratio which, on report, varied from 70% clinical/30 % academic to 80%clinical/20% academic. Had the Minister, after the signing of the AFP, identified what portion was to be the SIFT, any such confusion would have been avoided.

There is a question, given the AFP definition of "Minister's Funding" as "payments from MSI for insured services", whether the Minister would have the authority under the Health Services and Insurance Act to allocate a portion of such monies to a special teaching increment. This question does not, however, change what appears to be the intent of the provision.

The second area under Minister's Funding that is significantly different from the first AFP is found in Article 3.3. The intent of this provision is to allow the parties to develop a formula which would allow for the extension of the AFP into later years.

The Department of Medicine did put forth a proposal which was not accepted by the Department of Health. As a result there was no extension of the AFP under this article. The parties, however, in discussions separate from this provision, did agree on an extension to March 31, 2005 in return for a funding increase for the additional year. .

The third area under Minister's Funding that is different from the first AFP is the determination of the appropriate rate for funding pursuant to article 3.2. The Minister is required to provide funding as outlined in Schedule F of the AFP which identifies, for a specific period of time, a funding rate for Specialists and a separate rate for General Practitioners. When new physicians are added pursuant to article 3.2, the logical interpretation would be that the funding rate would be set out in Schedule F. The Department of Medicine has taken the position, which the Department of Health appears to have accepted, that the Specialist rate identified in Schedule F is a weighted average rate based on the number of Geriatricians and the number of Non-Geriatrician Specialists.

In other words, each time a specialist is added, either as part of the planned and approved vacancies pursuant to article 3.2, as a result of agreement for new positions pursuant to article 6.9, or the addition of new positions agreed upon by the Department of Health, the Specialist rate in effect at the time of the addition and future Specialist rates must be recalculated.

The language of the AFP does not support this application.

Finally, as noted in an earlier section, the AFP is not clear in its intent with respect to the Minister's funding. Schedule F identifies that funding would increase by 2% on October 1, 2002, October 1, 2003, and April 1, 2003. This is identified as "increase from Master Agreement". The

actual amounts of the MSU increases under the Master Agreement are 2.12%, 2.07%, 2.03%, and 1.99 %, one increase being due to the conversion of the GST adjustment. However Schedule F in the "Summary of Changes", as well as the letter outlining the tentative agreement, indicates an amount of 2%. It is not possible, with the documentation provided, to determine what the real figures should be. Given the annual dollar value of the AFP, such differences can result in a significant dollar value variation.

3. Shadow Billing

The first AFP had provided for mandatory shadow billing information to be used as the evaluation method unless an alternate method of evaluation was agreed upon. The second AFP continued this concept but underlined the intent to move from shadow billing to another measurement system, through the statement, contained in article 6.6, that "The parties agree to use best efforts to have the Evaluation System to be developed so as to eliminate the need for Shadow Billing by March 31, 2003." The expressed dates are inconsistent given that the earliest signature on the signing blocks of the AFP is April 30, 2003.

A review of correspondence indicates that the Department of Medicine's attempts to have an alternative evaluation system developed were countered by the Department of Health position that shadow billing was an essential part of the healthcare measurement system, and, as such, could not be replaced. This position is inconsistent with the written objective of the AFP or the verbal objectives that were expressed to the audit team by both the Department of Medicine and Department of Health officials. Given the written objective, it is not a surprise that physicians, believing the shadow billing system to be replaced, would not give the shadow billing the attention expected and needed.

The Department of Medicine was prepared, indeed anxious, to have the deliverables defined. The Department of Health, on the other hand, notwithstanding the clear wording of the AFP, appeared to be having second thoughts about moving away from shadow billing.

There were no significant changes to AFP provisions with respect to physician vacancies or absences, or to the provisions for claims against Insured Professional Services.

The Negotiation Process

The audit team found that, prior to 2003, negotiations for AFPs or for their renewal, were not a structured or coherent process. While there was some documentation available for the first Department of Medicine AFP which allowed the audit team to a reconstruct the flow and outcome of the negotiations, there were no Department of Health documents prepared which outlined the overall financial implications of the new arrangement, nor any documentation indicating how the AFP would fit in the strategic direction of the Department of Health.

Interviews led the audit team to conclude that the negotiations were a series of one-on-one closed and undocumented sessions leading to a fragmented outcome. There was no evidence that the Department of Health asked for, or received, any specific financial authority from other authorities within the Government.

The negotiations for the renewal of the AFP were even less structured. Once again the prime documentation available is from the Department of Medicine. There is very little documentation available until the parties apparently reached a settlement and even the documents reflecting the agreement are of some question as the final signed AFP does not reflect the main points of the document. The audit team heard from interviews, that most of the key parts of the negotiations were carried on by the then Deputy Minister with little documentation passed on to those who were left to administer the contract.

The Department of Medicine, in both sets of negotiations, had clear, identifiable, and substantiated objectives which were articulated in its proposals to the Department of Health.

For example, a key proposal from the Department of Medicine was to include the Division of Geriatric Medicine, which previously had had its own AFP, in the renegotiated AFP. This was agreed to but it was only during the preparation of the final wording that the AFP administrators from the Department of Health were advised, by the Department of Medicine, that the FTE rate in the Minister's Funding, pursuant to Schedule F, was to be a weighted rate based on the number of Geriatricians and non-Geriatrician Specialists. As the Department of Health administrators were not involved in the negotiations and as there was no supporting documentation, the matter was reluctantly agreed by the Department of Medicine. This problem could have been avoided had there been adequate documentation clarity, or greater involvement of key managers from the Department of Health.

At the time of the renegotiation of the AFP, the Physicians Services group of the Department of Health was undergoing extensive reorganization with the result that many, if not most, of the critical negotiations discussions were between the then Deputy Minister and the Chief of the Department of Medicine until the tentative agreement in June, 2002. For no explainable reason, the finalized AFP did not result until eight to ten months after that tentative agreement had been reached.

Recommendations

DOH should review its negotiation process and procedures to ensure that there is a clear understanding of objectives, authorities, communications and specific roles of the participants.

Rationale: The project interviews have revealed that the AFP negotiation process was not done in a structured, coherent, coordinated manner, with the roles of the various participants not

clearly understood. This resulted in less than optimal utilisation of the negotiation process and outcomes. Efforts should be made to improve working relationships among AFP stakeholders through clarity of expected outcomes, deliverables and processes. Interviews have clearly shown that there is a lack of effective communications among the parties and a lack of confidence, which should be addressed.

Given the dollar value of the DOM AFP, specific authorities and processes should be well established for future AFPs, documented and approved. Formal approval should be also be provided by Treasury and Policy Board and/or the Department of Finance.

Rationale: There is no documentation in the DOH detailing the process and structure of DOM AFP negotiated funding and rationale for the dollar changes and the additional FTEs added**.** The audit team was informed that many components of the DOM AFP were negotiated and agreed to in undocumented closed bilateral meetings between the previous Deputy Minister of Health and the Head of DOM. No files or documentation could be found to support agreements that were said to have been reached. This lack of accountability and documentation pose a serious problem for current DOH managers and compromise value for money for public expenditures. Without this documentation and its rationale, it is impossible for the province to determine value for money.

DOH and DOM should take steps to ensure that the finalized AFP contract is produced and executed in a more timely fashion.

Rationale: The AFP contract documentation indicates that the negotiations were finalized in June 2002. Interviews disclosed that negotiations carried on after this date into the fall of 2002, with a final signed document not being available until May 2003. These long delays resulted in the need for retroactive payments, as well as physician resource adjustments. It was further pointed out to the audit team that the delays in the negotiation process had a negative effect on recruitment, and that several likely faculty prospects were lost as a result of not being able to obtain confirmation of funding, even through DOH had acknowledged informally that the positions were needed.

AFP deliverables should be immediately developed by AFP partners and a timetable established for agreement. The process should be led by DOM and CDHA, and subject to approval by DOH.

Rationale: The lack of clearly defined and stated deliverables has a major impact on performance management of the DOM AFP. Currently, there is insufficient correlation between AFP deliverables and CDHA goals and objectives. AFP stakeholders should immediately begin the process of developing an accountability and evaluation framework, with specific deliverables, performance indicators and productivity targets.

DOH should determine the formula between clinical and non-clinical funding in all future AFPs to ensure clarity of expectations and deliverables.

Rationale: The absence of this formula in the existing AFP has raised differences in opinion about what the expectations are among all of the signatories.

4.0 COMPONENTS OF THE AUDIT PROCESS – FINDINGS

4.1 FINANCIAL AUDIT

4.1.1 Approach

The financial audit included meetings with the external auditors for the Department of Medicine, Grant Thornton LLP, and discussions with staff of the Auditor General's Department for the Province of Nova Scotia. A review was made of the annual audited reports and reconciliations made of the trial balances for each of the departmental entities, ACADOM, UIMRF and UIMC. Test audits were performed on bank accounts, deposits and disbursements, funding flows from the Department of Health to Atlantic Blue Cross Corporation and subsequently to the Department of Medicine bank accounts. Receipts from non-MSI billings were reconciled to bank accounts on test basis for each of the three years. The audit team examined the payments made to physicians through the UIMRF bank account and the annual reporting of these payments to the Department of Health.

In performing the financial audit of the DOM AFP, the audit team first met with the Partner and the Senior Manager of Grant Thornton LLP, the external auditors for DOM. In addition, meetings were held with several staff members of the Provincial Auditor General's (AGs) Office, individuals who had been directly involved in reviewing the AFP arrangements between the DOH and the DOM.

In both interviews, the team gained an understanding of the scope of these audits and solicited comments relative to the current DOM AFP audit. Likewise, the details included in the Grant Thornton audit letter regarding the controls aspect of the DOM were reviewed.

A concern expressed by the AG's Department related to the erosion of the internal audit function within the DOH for reasons of economy and consolidation. Another concern expressed was that the difficulty in evaluating AFPs was becoming more of a problem than the actual control over payments, given that the electronic systems now in place appeared to be adequate. The AG's Department has not looked into the "intermingling" of Health and Education funding currently being provided to the DOM. Neither has it examined the practice of providing physicians with offices and administrative overhead as part of its AFP review. That examination is carried out on a facility-by-facility basis. Furthermore, until the DOH provides a clear definition of "value", it is difficult to suggest what type of information should be collected in order to make meaningful assessments. In the absence of such a definition, the AG's audit approach will likely continue to use shadow billing in its determination of value for money.

Throughout the examination, the team was reminded by the evidence presented of the imbalance of funding sources between Health and Education in support of DOM administration. On the

basis of any reasonable split between clinical versus academic involvement, it is clear that Health dollars are heavily subsidizing Medical education. Moreover, the Department of Medicine subsidizes Dalhousie's payments to faculty members for the year ended March 31, 2004. The subsidy amounted to $2.1 million that year.

The institutional structure within the DOM is highlighted in this section of the Report. The various entities and the manner in which funding is tracked throughout are outlined as well. A number of minor recommendations are included.

Overall, the team was impressed by the completeness of the files and financial records at DOM and DOM staff's ability to provide information and documentation in every aspect of questioning. Likewise the team was very impressed with their professionalism and their willingness to cooperate fully during the course of this audit.

4.1.2 Findings

The audit team found the accounting transactions within the Department of Medicine to be well recorded and done so within generally accepted accounting procedures. While the corporate make-up of the DOM is somewhat complex from an accounting perspective, the audit team was able to obtain all requested documentation and explanations and the administrative staff were fully cooperative and helpful throughout the entire audit.

The audit team noted the comments made in the external audit report with respect to departmental controls. The majority of funding transactions within the Department of Medicine, both in terms of receipts and disbursements, are made electronically. The team has suggested that written authorization be maintained on file for administrative staff outlining limits of approval for such disbursements. Given the degree of funding being provided to the Department of Medicine by Capital Health, the audit team has recommended CDHA, as well as the Department of Health be provided with copies of the Department's annual audited reports.

The Department of Medicine records its receipts and expenditures through four separate account structures:

- UIMC-essentially the main bank account;
- ACADOM Limited-the main distribution point for non-research operational funds;
- UIMRF-controls the receipts and expenditures of departmental scientific activities. It also serves as the payment source of revenue shares to department members; and,
- Medlea Inc. - owns computers, office equipment, etc. which it leases back to the DOM.

The attached summary provided by the Department during the course of the audit, outlines in substantial detail the source and application of funds flowing through the Department at any given period.

From the team's discussions, it is not entirely clear whether the Department of Health fully understands the variety and sources of revenue streams within the DOM and the nature of the expenditures involved when determining the amount of overhead funding to be included in the AFP. There likewise does not appear to be an understanding of the degree to which ACADOM revenue is used to reimburse Dalhousie University Medical School for "department members salary expense". In correspondence from the DOM dated November 19, 2004, it is evident that based on any reasonable determination of the actual split between academic and clinical activities within the Department, the funding provided by Dalhousie falls well below its appropriate share. For the year ended March 31, 2004, Dalhousie received a reimbursement from DOM of $ 2.1 million, the primary source of which can reasonably be concluded as being the AFP.

From the team's discussions, interviews and document examination, it is clear there is a heavy reliance on electronic mail for decisions involving substantial amounts of public monies. While this provides convenience to the parties, it is suggested that monthly summaries of such transactions be confirmed by signed correspondence on appropriate letterhead.

As previously mentioned, the Department of Health is not fully conversant with the source and application of DOM funding. It is not aware, for instance, that the DOM will occasionally record a surplus during one of its fiscal years. The audit team does not intend to comment on the ownership of such a surplus; it is suggested, however, that the Department of Health take steps to determine what financial information it should receive from the DOM, including established reporting timeframes, in order for it to be appropriately informed.

The Business Office of the DOM is well run and well organized. Day-to-day transactions are carried out in a detailed and efficient manner. The team had no difficulty in gaining access to files and other material requested during the course of the financial audit. It was observed, however, that because of the limited size of the operation, cross-training of the three staff members has not been possible to the extent desired in the event of unexpected or long-term absences. This is merely an observation, not a recommendation.

Non-MSI billings are invoiced by two Billing Clerks. Each is responsible for a certain geographic area of clinical activity; one, the Halifax Infirmary, the other, the V.G.H. Receipts are recorded and deposited using separate summary sheets and separate deposit slips. While not of major significance, it is suggested that these processes be consolidated for purposes of simpler reporting. It is also noted that there is no recording made of un-collectable accounts in this regard.

The DOM also has an arrangement whereby it shadow bills for family physicians who attend residents of the Veterans Memorial Building. A 3% handling fee is charged for this service.

Recommendation

The DOH and CDHA should receive a copy of the annual DOM audited financial reports, and make any appropriate determinations relating to financial operations.

Rationale: DOM has an independent audit conducted of its financial records on an annual basis. These reports cover all the elements of DOM operations. Given the size of the AFP contribution to DOM, it would be appropriate that DOH and CDHA be provided with these reports.

Department of Medicine
Operating Funds Flow Summary

This summary identifies the various sources of funds used to finance Department of Medicine (DOM) annual operations in the areas of patient care, teaching, and research.

Funding for DOM annual operations on a year-to-year basis comes from a variety of sources including:

- The University
- The Hospital District
- The Department of Health
- Miscellaneous Other Sources

The funding is administered and flows through a number of entities and bank accounts that reside both within and outside the departmental practice plan. These include:

- The University
- The Hospital District
- DOM Practice Plan Entities / Accounts:
    - UIMC
    - ACADOM Limited
    - UIMRF
    - Medlea Incorporated

The diagram on the following page shows the various flows of funds associated with the DOM annual operations budget. The shaded boxes represent departmental practice plan accounts and entities.

University and Hospital District Accounts

University and Hospital District funding is made available to the Department of Medicine through accounts set up within the accounting structures of the respective institutions. The Department of Medicine makes use of the funding made available to it by charging various expenses to these accounts. Usually the amount of expenses charged to these accounts exceeds what the University or Hospital has budgeted for these accounts; thus, there are transfers of funds from various practice plan accounts (UIMC, UIMRF, and ACADOM Limited) to reimburse the institutions for any overexpenditures occurring in the accounts.

Department of Medicine Practice Plan Accounts

Department of Health funding and the miscellaneous other revenues that fund departmental operations are administered through departmental practice plan bank

accounts (UIMC, ACADOM Limited, UIMRF, and Medlea Incorporated). These accounts are the subject of an annual audit now carried out by Grant Thornton.

UIMC

UIMC is simply a bank account. It can't own assets and it can't carry over funds from one year to another. During the course of a year, monies flow into the UIMC account and monies flow out of it, and at the end of each fiscal year when all normal transactions have been completed, if there are any funds remaining in the account, they are transferred to the ACADOM Limited account or the UIMRF account for use in the next year's budget.

Monies flowing into the UIMC account during the year include:

- Department of Health funding
- Non-MSI clinical receipts generated by department members
- Various department member revenue share recoveries from external sources
- Clinical fellow salary funding from external sources
- Physician services staff salary recoveries
- Interest revenue earned on the UIMC account balance

During the year monies flow out of the UIMC account to:

- Department members as revenue share payments
- ACADOM Limited to fund non-research related operating expenses of the Department
- UIMRF to fund research related operating expenses of the Department
- The Dalhousie University departmental operating account to reimburse it for some department member salary expenses

ACADOM Limited

ACADOM Limited is a legal entity (a non-profit organization) established as a vehicle to handle the non-research operating and administrative expenses of the Department. It can own assets. The other benefit of ACADOM is that it provides the Department with the capability of carrying over operating funds from one year to the next.

Monies flowing into the ACADOM Limited account during the year include:

- Transfers of funds from UIMC (as noted under UIMC above)
- Administrative salary reimbursements from UIMRF
- Interest revenue earned on the ACADOM account balance
- Miscellaneous revenues supporting the non-research activities of the Department

During the year monies flow out of the ACADOM Limited account to pay for the non-research operating expenses of the Department including:

- Some administrative staff salaries (paid directly to individuals)
- Reimbursements to the Hospital District departmental operating account for some administrative staff salaries
- Department member and administrative staff travel expenses to meetings and conferences
- Resident travel expenses to meetings and conferences
- Recruiting expenses associated with the hiring of new department members (eg., advertising, travel, moving)
- Entertainment expenses (eg, visiting lecturers, departmental and divisional gatherings, gifts)
- Education expenses (eg, visiting lecturers, books and subscriptions, staff courses)
- Office expenses (eg., stationery and supplies, postage / delivery, telephone, small equipment costs)
- Equipment lease costs (Paid to Medlea Incorporated)
- Professional fees (eg., legal, audit, consulting)
- Miscellaneous expenses (eg., coffee and water supplies, donations, membership fees)

As noted above, any monies remaining in the ACADOM Limited account at year-end are carried over for use in the next year's operating budget.

UIMRF

UIMRF is a legal entity (a non-profit corporation for scientific research). It handles the research related revenues and expenditures of the Department.

Monies flowing into the UIMRF account during the year include:

- Transfers of funds from UIMC (as noted under UIMC above)
- Clinical Scholar Awards coming from the Dean's Office for some of the clinician scientist members of the Department
- Overhead revenues generated from contract research projects of department members
- Investment income (i.e., interest, dividends, and capital gains) generated by the investments held in the UIMRF portfolio

During the year monies flow out of the UIMRF account to pay for the research operating expenses of the Department including:

- Revenue share payments to department members
- Reimbursement to ACADOM Limited for some administrative staff salaries
- Reimbursement to the Dalhousie University departmental operating account for some department member salary expenses
- Department member and administrative staff travel expenses to research meetings and conferences
- Research funding support in the form of project grants, fellowships, and studentships
- Research event expenses (eg., faculty and resident research days and evenings, QEII research dinner)

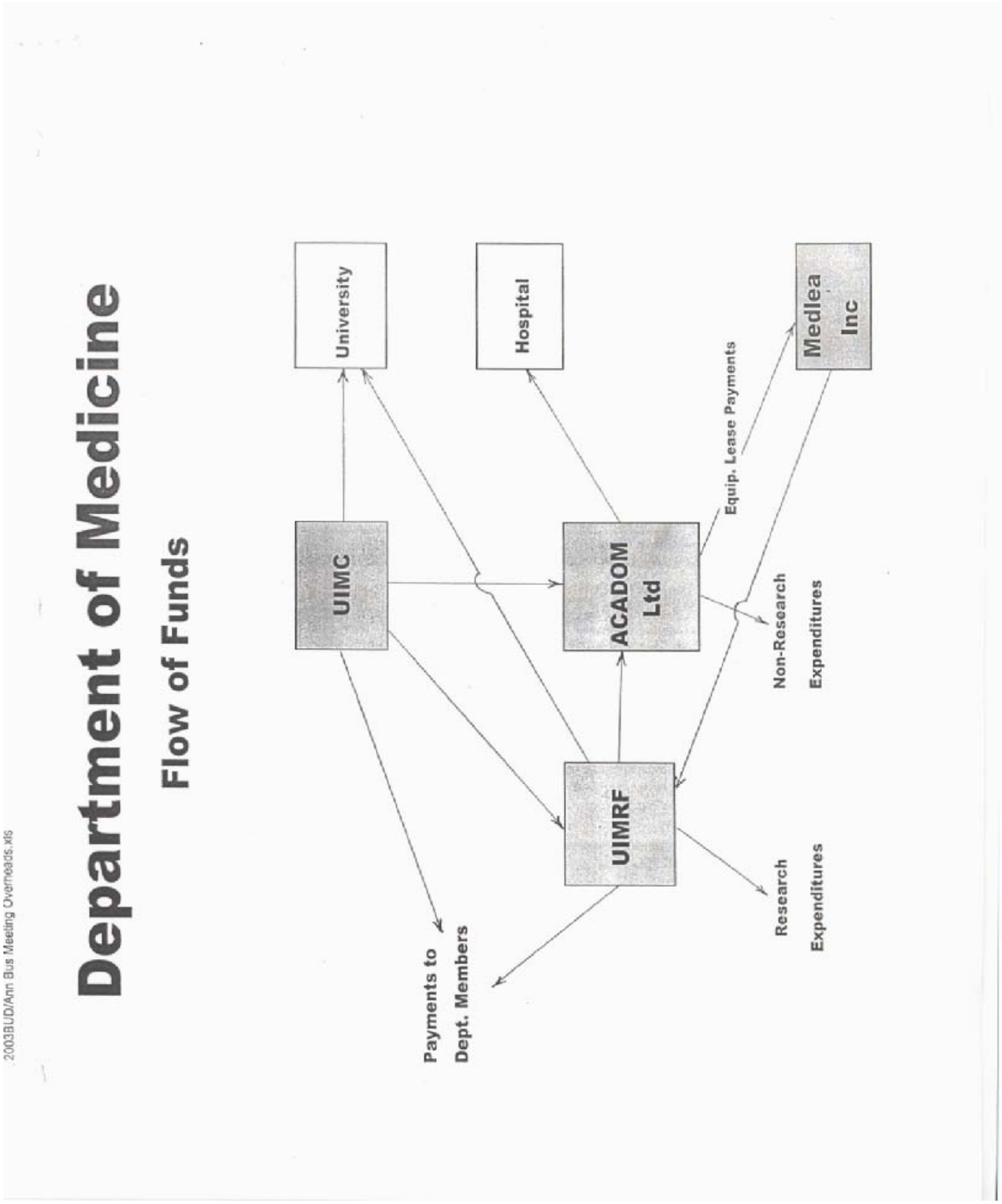
- Miscellaneous expenses associated with the operation of the departmental research office

Medlea Incorporated

Medlea Incorporated is a legal entity. It is an incorporated company that was set up to purchase fixed assets (eg., computers, office equipment, etc.), then lease them to the Department for department member use. Now that ACADOM Limited has been established and most computer equipment is now acquired through the hospital leasing system, Medlea's function is no longer needed, and it will likely be wound up in the next few years.

Medlea's main source of revenue is the equipment lease payments it receives from ACADOM Limited.

The shares of Medlea Incorporated are owned by UIMRF. When Medlea is eventually wound up, any remaining residual balance in its account will be transferred to UIMRF.


Department of Medicine
Flow of Funds
2003BUD/Ann Bus Meeting Overheads.xls
University
Hospital
Medlea Inc
UIMC
ACADOM Ltd
UIMRF
Equip. Lease Payments
Non-Research Expenditures
Research Expenditures
Payments to Dept. Members

4.1.3 Financial Audit Report

August 11, 2004

Ms. Jane Breckenridge, Director
Nova Scotia Department of Health
Physician Services
Joseph Howe Building
1690 Hollis Street
Halifax, NS, B3J 2R8

Dear Ms. Breckenridge:

RE: Audit report of the Department of Medicine of Dalhousie University, 2001, 2002 and 2003

In accordance with the terms of reference of the contract awarded to our firm for the financial audit of the above-captioned entity, we are pleased to enclose our audit report signed by our associate, J. Camille Gallant, Chartered Accountant.

The audit report is based on the consolidated operating budget of the Department of Medicine, Revenue Summary and Expenditure Summary attached thereto.

We also enclose a brief report to the Department of Health in connection with the work completed on the financial audit referred to above.

Should you have any questions regarding this or any other items pertaining to our contract, please do not hesitate to contact us.

We trust you will find this in good order and remain, sincerely yours,

Martine Durier-Copp, Ph.D.
Vice President
North South Group, Inc.

AUDITOR'S REPORT

To the Nova Scotia Department of Health

I have audited the Consolidated Operating Budget of the Department of Medicine of Dalhousie University for the three years, 2001, 2002, and 2003, which includes the Revenue Summary and Expenditure Summary for those years. These financial summaries are the responsibility of the Department's management. My responsibility is to express an opinion on these financial summaries based on my audit.

I conducted my audit in accordance with Canadian generally accepted auditing standards. Those standards require that I plan and perform an audit to obtain reasonable assurance whether the financial summaries are free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial summaries. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial summaries presentation.

In my opinion, these financial summaries present fairly, in all material respects, the revenue and expenditure transactions of the Department for the three years ended December 31, 2003 in accordance with Canadian generally accepted accounting principles.

The balance sheets and statements of revenue, expenditures and equity and cash flows of the accounting units of the Department for the three years then ended have been audited by other Chartered Accountants.

Halifax, Nova Scotia,
August 11, 2004

J. CAMILLE GALLANT
Chartered Accountant

Department of Medicine
Consolidated Operating Budget

Revenue Summary

	2003		2002		2001	
UIMC Revenues	27,892,400	69.8%	24,273,300	68.2%	21,067,500	67.2%
ACADOM Revenues	2,229,000	5.6%	2,189,400	6.2%	1,950,200	6.2%
UIMRF Revenues	2,033,400	5.1%	1,873,700	5.3%	1,879,200	6.0%
Total Funds Flowing Through DOM Bank Accts	32,154,800	80.4%	28,336,400	79.6%	24,896,900	79.4%
University Funding	3,423,100	8.6%	3,259,200	9.2%	2,869,500	9.2%
Hospital Funding	4,392,200	11.0%	3,994,500	11.2%	3,570,600	11.4%
Total Operating Budget	39,970,100	100.0%	35,590,100	100.0%	31,337,000	100.0%
% Increase in Total Budget	12.3%		13.6%			

Department of Medicine
Consolidated Operating Budget

Expenditure Summary

	2003		2002		2001	
Faculty Revenue Shares & Grp Ben	32,196,100	80.6%	28,450,700	79.9%	24,967,000	79.7%
Support Staff Salaries & Frin Ben	5,477,700	13.7%	5,037,900	14.2%	4,396,700	14.0%
Faculty & Admin. Travel Expenses	339,600	0.8%	356,500	1.0%	320,100	1.0%
Resident Travel Expenses	109,800	0.3%	104,200	0.3%	87,200	0.3%
Recruiting Expenses	153,300	0.4%	146,200	0.4%	109,400	0.3%
Entertainment Expenses	168,600	0.4%	158,800	0.4%	168,500	0.5%
Education Expenses	124,300	0.3%	75,500	0.2%	77,300	0.2%
Office Expenses	140,300	0.4%	97,500	0.3%	92,900	0.3%
Medlea Lease Costs	74,600	0.2%	105,500	0.3%	161,400	0.5%
Professional Fees	77,800	0.2%	96,000	0.3%	45,200	0.1%
Miscellaneous Expenses	42,600	0.1%	24,100	0.1%	23,500	0.1%
Research Grants, Fellowships and Studentships	370,900	0.9%	352,800	1.0%	266,100	0.8%
Research Events	22,600	0.1%	22,900	0.1%	27,300	0.1%
UIMRF Investment Writedown	0	0.0%	0	0.0%	113,000	0.4%
Overhead Exp - Hospital Oper Acct	628,800	1.6%	509,400	1.4%	429,600	1.4%
Overhead Exp - University Oper Acct	43,100	0.1%	52,100	0.1%	51,800	0.2%
Total Expenditures	39,970,100	100.0%	35,590,100	100.0%	31,337,000	100.0%

Report to the Nova Scotia Department of Health

The audit of the Consolidated Operating Budget of the Department of Medicine of Dalhousie University including the Revenue Summary and Expenditure Summary for the years 2001, 2002, and 2003 has been completed. J. Camille Gallant, CA, an associate of the North South Group Inc., has signed the report as of August 11, 2004.

The audit report is issued without reservation and indicates that the Revenue and Expenditure Summaries present fairly, in all material respects, the results of the revenue and expenditure transactions of the Department of Medicine in accordance with Canadian generally accepted accounting principles.

The audit of the Revenue and Expenditure Summaries was performed in accordance with Canadian generally accepted auditing standards and obtained reasonable assurance whether the Revenue and Expenditure Summaries are free from material misstatement.

J. Camille Gallant, CA, the signatory of the audit report, confirms that he is independent within the meaning of the Rules of Professional Conduct of the Institute of Chartered Accountants of Nova Scotia. North South Group Inc. confirms that it is not aware of any relationship that would impair its independence for purposes of expressing and opinion on the Revenue and Expenditure Summaries presented.

The balance sheets and statements of revenue, expenditures and equity and cash flows of the accounting units of the Department for the three years ended December 31, 2003, have been audited by other Chartered Accountants.

Management is responsible for the preparation of the Summaries of Revenue and Expenditure and the transactions and estimates reflected therein.

North South Group Inc. through its associate, J. Camille Gallant, CA, planned the audit on the basis of a substantive approach. Verification of the financial transactions covering the three years, 2001, 2002, and 2003 was conducted on a substantive basis so as to include the following:

- all of the revenue flow from MSI to the Department of Medicine;
- examination of the revenue flows on a test basis from the Capital District Health Authority and Dalhousie University;
- examination on a test basis of the payments to physicians; and,
- examination and analysis on a test basis of key expenditure categories of the entity.

No auditing, accounting or other issues were encountered during the conduct of the audit.

The auditors received full cooperation from the management and employees of the Department of Medicine.

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J. Camille Gallant, Chartered Accountant

4.2 VALUE FOR MONEY AUDIT

Value for Money (VFM) is a public management accountability approach used to assess the provision of services in relation to their responsiveness to public needs. It usually summarizes three distinct, yet interrelated, values: Economy, Efficiency and Effectiveness, often referred to as the 3 E's. In addition, the concept of VFM has come to include principles of prudence, diligence, compliance with rules and procedures, probity, integrity and equity in the administration of public services.

Economy can be best defined in terms of the acquisition of resources of appropriate quality and quantity at the lowest reasonable cost, and can be seen to respond to the following question:

> ***Are we getting the right inputs at the best cost?***

Efficiency is a resource-utilisation concept, which is concerned with the maximization of outputs at minimal cost, or the use of minimum input resources. It answers the question:

> ***Are we getting the most output from out inputs?***

Effectiveness is concerned with whether the goals and objectives for a particular program have been achieved, and with whether the right results have been obtained.
It responds to the question:

> ***Are the outputs getting the results that we want? Or, are we doing the right things?***

VFM Audit[6] is an important component of performance measurement and reporting and is ideally based on the enunciation of clear goals and measurable objectives, in addition to specific, quantifiable deliverables. Performance indicators allow program managers, in this case, DOH and the other AFP partners, to continuously monitor and assess performance and results obtained as against the agreed upon goals and objectives, and thus be more accountable for the expenditure of public resources.

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[6] *[ref.* ***Accountability, Performance Reporting, Comprehensive Audit, An Integrated Perspective****, Guy Leclerc, W. David Moynagh, Jean-Pierre Boisclair, Hugh R. Hanson, CCAF-FCVI Inc., 1996]*

In the case of the DOM AFP, value for money audit would generally be based upon the contractual terms and obligations of the parties involved. In this case, the VFM indicators would be based on the contracted terms and conditions of the AFP, namely, analysis of shadow billing information. The project team has further examined all available sources of data, including provisions laid out in Schedule B, AFP Deliverables and Accountability Framework, 2001-2006, so as to arrive at a comprehensive perspective and conclusions. The VFM audit component of this project has analysed and herein reports its findings, relative to what degree this AFP has provided value for money in terms of economy, efficiency and effectiveness indicators.

Principles and Criteria

Establishing clear auditing criteria is essential to a sound VFM audit process. Criteria provide clear benchmarks or reasonable standards against which findings may be compared, in order to draw conclusions. The Office of the Auditor General of Canada defines audit criteria as follows:

"In Value for Money Auditing, criteria are defined as reasonable and attainable standards of performance and control against which the adequacy of systems and practices, and the extent of economy, efficiency and effectiveness of operations, can be assessed in the particular circumstances of the audited organization".

Criteria must be suitable and appropriate to the circumstances of the organization under review; they must be relevant to the issues being audited. Generally accepted criteria of audits include [CCAF]:

⇒ *Reliability* reliable criteria result in consistent opinions when used by different auditors in the same circumstances;

⇒ *Objectivity* Objective criteria are free from any bias of the auditors or management or the client;

⇒ *Usefulness* useful criteria are those resulting in findings and opinions that meet the client's information needs;

⇒ *Understandability* understandable criteria are those that are clearly stated and are not subject to significantly different interpretations;

⇒ *Acceptability* acceptable criteria may be developed by management or by the auditors and be derived from standards established by regulatory bodies, professional associations or other recognized authorities;

⇒ *Comparability* comparable criteria are consistent with those used in similar comprehensive or VFM audits within the organization, in similar circumstances; and,

⇒ *Completeness* auditors should endeavour to ensure that all significant criteria have been identified.

The above criteria guided the work of the project team so as to ensure a coherent, systematic, and comprehensive approach. The Value for Money Audit was undertaken with a multi-instrument framework. Data were obtained from a variety of sources, and research techniques, including:

- Documentation review and data analysis;
- Comparative analyses; and,
- Interviews and surveys.

In designing the VFM accountability framework for the AFP, it was intended that five broad areas of analysis would be utilised:

1. Before and after AFP comparison (examining volume – type of service – access to services, while recognizing that the AFP has introduced changes to patterns of care delivery);
2. Comparison between AFP and non-AFP programs (i.e. FFS);
3. Comparison between/among comparable programs;
4. Comparison between/among comparable jurisdictions /geographic regions; and,
5. Compliance with terms of contract (also to be covered under the Contract Management/ Performance Evaluation).

The sections below describe the audit team's findings.

4.2.1 Economy Analyses

This component of the VFM audit attempts to answer the question of: ***Are we getting the right inputs at the best cost?*** In this connection, the team examined how the process or formula for resource allocation for the DOM AFP by DOH, including the number of FTEs, financial, and administrative infrastructure, was established.

Information sources and instruments for this analysis included: interviews with officials from DOH, DOM, CDHA; file analysis; analysis of CIHI information and guidelines regarding specialists to population ratios, MSI information, DOM information (annual reports and practice plans), and DOH files.

4.2.1.1 RESOURCE ALLOCATION AND FTE ANALYSIS

The resource allocation process for the DOM AFP was not a well documented in the AFP; this process lacked clarity since the evolution of the AFP from 1997 to date. The determination of the number of FTEs to be included in the funding by the Department of Health was the subject of negotiations at the time of the first AFP and again at the renewal of the current AFP. During the life of the AFP, FTEs have been added, but in many cases there has not been, in the opinion of the audit team, adequate documentation to establish the need for the additional resources.

One of the major problems in conducting an analysis of the resources allocated is that the definition of an FTE did not provide useful guidance to the audit team.

In the first AFP the definition of an FTE was:

> "FTE means Full Time Equivalent. The FTE measure attached a numerical value to the clinical (contract emphasis) activity level of physicians based on their fee-for-service earnings for a given fiscal year. Lower and upper benchmarks are established for each specialty physician group. Physicians whose income falls between the lower and upper benchmarks for their specialty are determined to be 1.00 clinical FTE. Physicians whose income is below the upper benchmark are determined to be a value less than 1.00 FTE. Those above the upper benchmark are determined to be a value greater than 1.00 FTE. These benchmarks were established nationally and are provincially adjusted based on charges (sic) to the Medical Service Unit (MSU)."

As a measure, this definition is confusing and ambiguous. It mirrors the early CIHI definition that was used for compensation for human resourcing comparisons. The AFP parties apparently agreed during the negotiations for renewal that the existing definition was not sufficient and inserted the following definition in the current AFP:

> "F.T.E. means Full time Equivalent and in particular the full-time equivalent measure ascribed to each Department Physician who provides full-time services to the Department on an annual basis pursuant to the annual performance evaluation process. Persons who do not perform full time services to the Department shall be assigned a proportioned FTE amount"

Again, as a measure, this definition leaves much to be desired. However the latest definition does indicate that it is the Department of Medicine which determines what service is provided pursuant to the annual performance evaluation process. It appears that the Department of Health funding is based on a rate per FTE, but that the makeup of the FTE is determined by the Department of Medicine.

In its interviews the audit team heard on a number of occasions that the AFP was structured on the understanding that the Department of Health would fund an FTE on the basis of somewhere between 70 % to 80 % clinical provision and 20 % to 30 % academic provision. As noted elsewhere in this report, the audit team found no written evidence as to what that figure was intended to be.

While there is a formula for the clerical and administrative resources, there is no such formula for physician resources. The AFP requires, in article 9.1, that:

> "The Department Head will maintain a physician resource plan in collaboration with the physician resource plan of the District which shall be consistent with the physician resource plan of the provincial Department of Health."

The heart of physician resource planning requires that the Department of Health have a Health Human Resources plan, that the interested/affected parties, in this case the District and the Department of Medicine, have input into the plan and, most importantly, are aware of the requirements of such a plan. These links and inputs do not exist. The Department of Health has been mandated with the development of a Provincial HHR plan for at least a decade, but no consistent documented plan has been completed.

The District has done considerable work on its human resource planning, and the audit team observed positive steps being taken to ensure that the resource requirements of the District, at least, are identified and the necessary recruitment steps in place. However, this plan can hardly be integrated with a provincial plan that does not exist.

The Department of Medicine is thus left to "maintain a physician resource plan" which is partly a reflection of workloads and partly a wish list of Department of Medicine Divisional needs or desires, the latter being a balancing of the strongest voices and the most desired and obvious requirements.

With the recognition that the resource planning process is a faulty and fragmented process, the resource analysis addresses two areas: the allocation of resources within the funded FTEs and the control of, and payment for, vacancies and absences.

Allocation of Resources

The determination of the resource requirement and the allocation of the resources within the AFP, with a few exceptions, has primarily been the purview of the Department of Medicine. The audit team found no evidence that the QEII, at the time of the first AFP, had any input into the resources to be funded or to the allocations within the FTEs ultimately funded. There was evidence that the Department of Health had some input into the first AFP in that it was the Department of Health which wished to add Medical Oncology positions to the AFP, but there

was no evidence to indicate that it had placed parameters around the allocations within the funded FTEs.

At the time of the renewal of the AFP, there is only verbal evidence that the Capital District Health Authority had any input into the resource allocations of the renewed AFP. The renewal of the AFP resulted in the positions at the Dartmouth General being placed in the AFP but it is not clear whether this was at the request of the Department of Medicine or the Department of Health. CDHA apparently supported the move to have new Dartmouth positions in the AFP to assist in its service objectives. However, in interviews with the Department of Medicine and the Department of Health, each says the other requested it. There was no documentation around this issue and the audit team had to rely on the verbal submissions and the fact that the Department of Health ultimately approved the positions.

In its first AFP proposal, the Department of Medicine made submissions indicating its current complement allocations and the proposed complement allocations. For example the 1997 complement allocation was expressed as:

	Patient Care	Teaching	Research	Div Admin	Dept Admin	Total FTEs
Cardiology	16.10	1.20	1.25	0.75	0.45	19.75
Dermatology	1.80	0.60	0.10	0.20	0.20	2.90
Endocrinology	2.20	0.90	0.35	0.35	0.20	4.00
Gastroenterology	5.70	0.90	0.80	0.80	0.35	8.55
General Medicine	5.50	1.60	1.20	1.10	0.40	9.80
Hematology	3.40	0.80	0.35	0.60	0.25	5.40
Infection Diseases	1.75	0.60	0.75	0.45	0.45	4.00
Nephrology	4.00	0.50	0.25	0.25	0.25	5.25
Neurology	4.00	1.40	1.40	0.70	0.50	8.00
Physical Medicine	3.20	0.40	0.70	0.65	0.25	5.20
Respirology	4.55	1.50	0.75	0.45	0.30	7.55
Rheumatology	1.00	0.20	0.30	0.20	0.20	1.90
TOTAL	53.20	10.60	8.20	6.50	3.80	82.30
Allocation %	64.6%	12.9%	10.0%	7.9%	4.6%	100.0%

Neither the initial AFP, nor the AFP under audit, specifically addressed the allocations within the FTE structure. The AFPs addressed only the total FTE count.

From time to time, either as a result of reports to the Department of Health through the AFP, or as documents accompanying reports of vacancies, the Department of Medicine provided reports similar to the above detailing its current FTE count.

In reviewing the Department of Medicine annual reports, it was noted that the allocation and FTE counts varied slightly from the periodic reports that were provided indicating the complement on January 1st of each year. This anomaly was explained as being due to the fact that the two reports were structured differently, in that one was a slice of time (for example, the January 1st FTE complement report) and the other an FTE average for the year (the annual report). While this is a reasonable explanation, it underscores the problem that the audit team had in making a reconciliation of FTEs over a period of time. There is no common agreed reporting structure and the FTE allocations of FTE percentages seemed to change unduly over the annual period.

The DOM utilizes the percentage allocations within the FTE structure to determine the divisional, and subsequently the divisional members', profiles. While the evidence indicated that the divisions utilized the allocations to prepare the individual member profiles, the audit team was advised that the allocations were adjusted in synchronization with the changes that were made at the administrative level. Interviews by the audit team indicated that these changes were not reflected, nor adopted, at the divisional level. For example, a report from the Department of Medicine to the Department of Health might state, in part:

> "There are currently 2.15 FTEs vacant in the Division of XYZ at the CDHA. 1.00 FTE, a position previously held by Dr. X. XXX, will be filled by Dr. Y. YYY who has committed to a one year locum beginning July 1 of this year.
>
> The other 1.15 FTEs that are vacant are the result of three changes in complement that have recently occurred:
>
> - 0.60 FTE as a result of Dr. Z. ZZZ moving to practice at ABCD Hospital,
> - 0.15 FTE as a result of Dr. A. AAA moving from his .15 FTE community based position in Halifax into a full time position in the Division (i.e. replacement for Dr. B. BBB),
> - 0.40 FTE as a result of Dr. C. CCC reducing his/her department activities for health reasons.

> Recruitment efforts are on-going to fill these vacancies……. In the meantime, the current complement of the division has picked up the activities previously carried out by the above three individuals."

This type of FTE adjustment report is not unusual over the period of the AFP. The audit team found it difficult, and in some cases, impossible, to reconcile the FTEs resulting from such reported adjustments. Moreover, the Division Heads indicated during interviews that while some adjustments were made as a result of vacancies, the adjustments were seldom, if ever, made as a formal recorded change. Rather, they adjusted the workload and provided recognition for the individuals in the Division as part of their annual assessments. The Division Heads also indicated that while most of the activities of missing individuals were carried out by other members, not all of the activities would be picked up on a regular basis. The Division Head confirmed that the major emphasis in these situations was to ensure, in general terms, that the essential clinical workload was covered.

The allocations reported over the period of the AFP indicate that the clinical allocation varied from approximately 59 % to 63 %, while the research allocation varied from 12 % to 15 %. It was not clear from the interviews how the clinical allocation related to outcomes and the parties have not set any targets in this area, so the best that can be done is a monitoring role.

Vacancies

There are two provisions within the AFP providing direction to the parties as to the reporting of, and payment for, vacancies. The first provision is found within Article 6.0, "Deliverables, Evaluation and Workload" which states in part:

> "6.3 …….if the Department is reduced in clinical FTE component for a period exceeding 90 days the department Head will notify the Minister. Funding will be adjusted downward after this 90 days period to reflect the actual number of FTE positions in the Department at the rates per FTE noted in Article 3.1 and Schedule F, …….. In special circumstances, if it can be established through Shadow Billing that the reduction in FTE activity has not resulted in a reduction in the volume of services performed by the Department, the period of 90 days may be extended by mutual agreement between the Minister, the District and the Department Head."

This is slightly different than the provision in Article 9.0, Physician Resource Plan which states in part:

> "9.2 … if a physician leaves the Department or a Department Physician's Full Time Equivalency Status is significantly reduced for a period of 90 days or longer, the Department Head, in consultation with the administration of the District may take such action as is necessary to fill the vacancy or supplement the

> clinical activity. Funding for this position will continue throughout this 90 day period. ……..
>
> Beyond 90 days, funding for this position ceases as outlined above in Article 6.3. In special circumstances, if it can be established through the evaluation system that the reduction in FTE activity has not resulted in a reduction in the volume of services performed by the Department, the period of 90 days may be extended by mutual agreement between the Minister and the Department Head."

The intent, confirmed by the Department of Medicine and the Department of Health is that vacancies will be reported and that the funding would continue after 90 days when it could be established that the there had not been a reduction in services.

The audit team was provided with documentation indicating that the Department of Medicine did advise the Department of Health when a vacancy occurred. The team was provided with no documentation that would indicate that the District was formally aware of the vacancy or participated in discussions to establish that the reduction in FTE activity did not result in a reduction in the volume of services.

The Department of Health did take the initial steps, in 2003, to control the payment for vacancies over 90 days, but the documentation reviewed indicates that the decision to remove funding for the vacancies was not pursued. This apparently was the result of some undocumented discussions. In the three year period of the AFP there is no evidence that the Minister's funding was ever reduced due to a vacancy or a reduction in the DOM clinical FTE complement.

The audit team found no evidence that the Department of Medicine had ever established for an individual reported vacancy, through shadow billing, that the reduction in FTE activity had not resulted in a reduction in the volume of services. Neither was there evidence that there had been a reduction in the volume of services. In the opinion of the audit team the provisions of article 6.3 and 9.2 were not being met.

In the one instance where the Department of Medicine attempted to justify ongoing payment for a number of existing vacancies it was stated, in a letter dated June 20, 2003 to the Department of Health:

> "As you indicated in your letter, our AFP agreement does indicate that DOH funding will be adjusted after a 90 day period to reflect a decrease in departmental manpower unless it can be established that the reduction in complement has not resulted in a reduction in the volumes of services performed by the Department. Our internal figures indicate that the volume of services provided by the Department has not declined since our AFP was implemented. Annual activity

figures reflecting the number of MSI units attributable to service performed each year show the following:

1999 - 8,607,661 MSU
2000 - 8,796,301 MSU
2001 - 8,734,884 MSU
2002 - 8,961,172 MSU"

For whatever reason, the Department of Health did not respond to this letter to challenge the figures provided. The figures, while most likely accurate, purport to represent that shadow billing supports that the Department of Medicine had maintained its volume of services. However, no mention is made of the fact that the number of FTEs had increased from 98.85 FTEs on January 1, 1999 to 139.03 FTEs on November 1, 2002. This represents an increase of 40.6 % in resources, while the Department shadow billing remained relatively constant. This does not seem to be sufficient as a justification for continued funding; however, it was not challenged by the Department of Health.

The AFP requires, as a justification for continued funding, that the Department of Medicine establish the Department would not show a reduction in the volume of services. This does not seem to be relevant to the specialty area of vacancy. For example, a vacancy in Rheumatology could be offset by increased activity in Dermatology.

Recommendation

With respect to the provisions relating to the 90 day vacancy clause, DOH must ensure that payments to the DOM should not continue beyond the 90 days, unless the vacated position has been replaced. Payment should not be reestablished until DOH and DOM have developed a mechanism to ensure that the contracted level of activity is being maintained.

Rationale: Although the AFP provides for automatic payment for the first 90 days of a vacant position, payment beyond the 90 days has continued in the absence of adequate documentation that clinical activity has been maintained.

Absences

The AFP requires, in Article 9.2, that the Department of Health be advised of absences over 45 days. Article 9.2 states, in part;

"…The Department Head shall notify the Minister when a Department Physician is absent for a period longer than 45 days ……and the Department Head agrees to

> maintain their levels of clinical activity subject to reasonable absences, such as illness or vacation."

The audit found no evidence that the Department of Health had ever been formally notified that there was an absence of longer than 45 days. However the 2002-2003 Department of Medicine Annual Report makes numerous references to sabbaticals and pregnancy/parental leaves. The Department of Medicine provided a list of 10 sabbaticals taken during the 36 month period of the AFP totaling 67 months absence.

The issue of pregnancy/parental leave situations that had not been reported to the Department of Medicine also raised some concerns. According to the Department of Medicine, the physicians are placed on a form of paid leave which is intended to emulate the Dalhousie University benefit provision. The Department of Health, through its Master Agreement with the MSNS, funds the MSNS to provide physicians in the Province with a benefit plan which includes a form of income replacement for maternity leaves. The Department of Health is thus funding one organization for a benefit plan to cover physicians while paying another body for the services of that physician and, indirectly, for the benefit.

The absence provision does not require the Department of Medicine to justify, through shadow billing or other method, that the clinical activity is maintained during the absence. This is inconsistent with the requirement that justification be provided for vacancies over 90 days.

The audit team found that there were other forms of absences, including sick leave situations, which were not reported to the Department of Health.

As part of the review of absences, the audit team noted that the Department of Medicine provides a Group Insurance Plan to employees of the University Internal Medicine Clinic and ACADOM, legal entities within the Department of Medicine. The audit team was advised that benefits from this plan are extended to physicians within the AFP. As noted above, the Department of Health provides funds to the MSNS through the Master agreement to provide a benefit plan which includes many of the benefits included in the Department of Medicine plan. As noted, this is a situation where the Department of Health is funding two organizations for benefit plans.

Recommendations

With respect to the provisions related to the 45 day vacancy clause, the Department of Medicine should fully comply with its reporting requirements.

Rationale: The provision in the contract (9.2 of the AFP) is that DOH will be notified when a department physician is absent for a period longer than 45 days. The audit has indicated that the DOM doesn't report the 45 day vacancies, and is non-compliant with the contract. As well there

is no restriction on the reason for an absence or how long the absence can continue. Current provisions require no substantiation that clinical activity has been maintained.

The Department of Health should consider, in its renewal of the AFP, whether all absences should be funded and for what period of time.

Rationale: The provision in the contract for (9.2 of the AFP) is that DOH will be notified when a department physician is absent for a period longer than 45 days. The audit has indicated that the DOM doesn't report the 45 day vacancies, and is non-compliant with the contract. As well there is no restriction on the reason for an absence of how long the absence can continue. Current provisions require no substantiation that clinical activity has been maintained.

The Department of Health should consider, in renewing the AFP, whether the provisions that apply to 90 day vacancies, should also apply to 45 day absences.

Rationale: The current AFP contract is silent on the matter of requiring proof that workload in DOM does not decrease during absences. This creates an accountability and control problem for AFP managers.

The Department of Health should consider, in renewing the AFP, that funding for absences due to maternity is already provided for through other benefit plans funded by the Department of Health.

Rationale: DOM currently provides a maternity leave benefit to physicians within the AFP. There are no restrictions in this area within the AFP other than the requirement for the DOM to report absences greater than the 45 days. The Province currently provides monies to the Medical Society of Nova Scotia through the Master Agreement for a benefit plan which covers, among other things, maternity benefits. Under the current AFP, the DOH is actually double funding maternity leaves for DOM physicians in the AFP.

The Department of Health should consider, in renewing the AFP, that it is currently funding a benefit plan for physicians through the MSNS.

Rationale: The audit team noted that DOM provides a Group Insurance Plan to employees of the University Internal Medicine Clinic and ACADOM, legal entities within the DOM. The audit team was advised that benefits from this plan are extended to physicians within the AFP. DOH provides funds to the MSNS through the Master Agreement to provide a benefit plan which

includes many of the benefits includes in the DOM plan. As noted, this is a situation where the DOH is funding two organisations for benefit plans.

4.2.2 Efficiency Analyses

This component of the VFM audit attempts to answer the question of: ***Are we getting the most output from our inputs?***

The following sections provide an analysis of different aspects of efficiency and are based on statistical and financial analysis of: MSI information, DOM annual reports, DOH financial transfers, interviews with DOM physicians and administrators, ABCC, and CDHA administrators.

4.2.2.1 MSI SHADOW BILLING

Group Members Declaration

The AFP contains sections detailing the relationship of the AFP to regular "Fee for Service" billing. The audit team has found that there are a number of provisions for which compliance is either missing or questionable.

Articles 11 and 18 of the AFP require that physicians execute a declaration with respect to claiming or accepting payment under MSI. The audit found that the declaration form in use was, for the most part, the form from the previous AFP. This is important in that the previous AFP restricted MSI billing within only the QEII facility, while the new declaration form warrants that no claims will be made within the Capital Health District Authority. It was also noted that, aside from the direction contained in Article 18, there was no clear procedure for the submission of the forms to ABCC. Documentation indicated that in some cases the forms were sent to the Department of Health and, in others, directly to ABCC. ABCC appeared to be unaware that a revised form was required under the renewed AFP, nor that the form was to be first submitted to the Department of Health.

Recommendation

The Department of Health should clarify the procedures with respect to the declaration form and the procedure to be used for submission. Such procedures should form part of the Operational Manual referred to in other recommendations of this audit. Until such time as the Manual is in use, written procedures should be available to the Department of Health, the Department of Medicine and ABCC.

Billing Numbers

Article 11 of the AFP requires that "Billing Numbers or business arrangements" be "suspended" for the purposes and term of the agreement. This requirement was contained in the previous Department of Medicine AFP and is common to other Provincial AFPs. Interviews with ABCC indicated that there is no process or control in place to actually "suspend" the billing numbers. Rather, the physicians are identified in a special group (group 1227 for the DOM AFP).

Article 11 also provides that community based physicians cannot bill for other than those services contemplated by Article 3.9 and non-institutional based clinical work apart from the District and separate from the Department's activities. Interviews with ABCC indicated that the ABCC system does not recognize the geographic distinction and that as long as the billing claim is under a different business arrangement it would be allowed. The audit found no record of instructions of any type being formally communicated to ABCC detailing the rules to be applied to physicians, community based or otherwise, covered by the AFP. It is also not defined or clear what "non-institutional" means.

The audit identified a situation whereby an AFP physician had billed for work outside the CDHA. Subsequent investigation determined that billing was allowed under the terms of the AFP, but it raised the question as to whether such billing would have been allowed if the clinical work had taken place within the CDHA. Discussions with ABCC indicated that the billing would have been allowed as there are no system restrictions in place to reject such claims.

At the onset of the audit through interviews the Department of Health indicated that only community based physicians of less than 0.5 FTE value were allowed to submit claims against MSI. The AFP is silent on this issue and ABCC indicated it was unaware of such restrictions nor could, with the current systems, such physicians be identified. The Department of Medicine, for its part, indicated that no such restriction existed. The audit found internal Department of Health correspondence which indicated that DOH was aware of this restriction but noting that it was too late to raise the issue or to have it placed within the AFP contract.

Recommendations

The Department of Health should establish clear rules with respect to billing procedures, communicate these rules to ABCC, and ensure that the necessary system safeguards are in place to properly administer the rules. The rules should also be contained with an operational manual which is made available to any person involved in the administration of the AFP.

DOH should review the practice of including community-based physicians in AFPs. The parties to the AFP should reach agreement on who should be allowed to make claims

against MSI and under what circumstances. The agreement and the resulting rules should be clearly and formally communicated to ABCC.

Physician billing numbers of those who are not allowed to bill should be clearly suspended; i.e. no billing of any form allowed under the billing system. The Department of Health and ABCC should determine the billing rules for billing under section 3.9 of the AFP and for reciprocal billing.

Rationale: There is a lack of formal instructions given by DOH to ABCC regarding the administration of DOM AFP. Interviews indicated that there is confusion with regard to the disposition of billing numbers and billing arrangements for the members of the DOM AFP. An operations manual should be developed for AFPs, with clear procedures, rules and regulations, reporting requirements, deliverables, etc.

Communications between DOH and ABCC should be strengthened and formalised with respect to AFP management (monitoring of billing numbers, physician complement, clarity of timelines for reporting shadow billings, documentation requirements, etc).

Shadow Billing

The Preamble to the AFP Contract provides, in part:

> "..the members of the Department of Medicine for the District collectively carry out an unique and special combination of clinical, teaching, research and administrative activities for which a system of payment other than fee for service is appropriate."

Recognizing this, the AFP contract commits to the development of deliverables and an evaluation process. In the absence of any agreement on the deliverables and the evaluation process the parties have agreed that "shadow billing" will continue.

Article 6.6 of the AFP contract requires that all Department Physicians shall "shadow bill" on a mandatory basis as a means of evaluating the services provided pursuant to the AFP contract.

The AFP does not give any other guidance with respect to evaluation in the absence of agreed upon deliverables. All parties to the agreement recognize that the AFP environment varies to a significant degree from a fee for service environment, and also agree that many of the services provided under the AFP which are intended to improve the delivery of healthcare do not fit within the existing codified fee for service structure. They have, however, failed to provide within the AFP contract any alternatives or additions to shadow billing to reflect any difference in practice style.

The AFP contract also recognizes that new methods of delivery including the use of physician extenders, and nurse practitioners, to name only two, will be utilized. Again the service codes do not recognize this changed delivery method nor the revised supervisory roles of physicians.

The audit team observed a number of initiatives whereby physician services or physician time was utilized for improved health care but that the service or time would not have qualified for payment under the fee for service system.

As one of the examples of an improvement to the health care system which would likely not have occurred under the fee for service environment, the audit team's attention was drawn to the fact that the Cardiology Division's wait time for tertiary transfers from Cape Breton was longer as compared with other institutions in Nova Scotia. This would not be unexpected since there is a standardized central triage process. However, the Cardiology Division identified, through a wait time analysis by institution, that inpatients from Cape Breton had a longer wait time for transfer. Through a team based analysis, it was determined that with a change in the distribution of transfers by day of the week, the wait time for transfers from Cape Breton could be made comparable to tertiary transfers from other institutions. Under a fee for service arrangement there would have been no incentive for physicians to collaborate in such analytical endeavors.

During interviews with the Department of Medicine, there was general acknowledgement that shadow billing is not considered an important issue and that many physicians do not adhere to shadow billing as a priority in their daily routines. The interviews also identified that this same attitude existed whether it was for shadow billing for a Nova Scotia resident or for a patient whose claim would be subject to reciprocal billing.

In interviews with ABCC, it was noted that shadow billing was subject only to the random service verification audits and not to any other comprehensive audit process. ABCC had indicated, in February, 2002, that such comprehensive audits did not take place and asked for direction from the Department of Health. No direction was given and the matter was not pursued.

To address this discrepancy, in July of 2004, the audit team requested the Department of Health to instruct ABCC to conduct a comprehensive audit of the shadow billing so that its analysis of shadow billing data would be conducted on audited information (akin to FFS data). The Department of Health arranged for ABCC to conduct an audit to determine whether:

- shadow billings were submitted in accordance with the Physician's Manual and its Preamble; and,

- the Department of Medicine provided shadow billing for all insured service encounters provided.

ABCC conducted an audit covering the period January 1, 2004 through March 31, 2004. The audit included an onsite audit covering examination of patient charts and other documents relevant to the audit as well as an analysis of the shadow billing for that period.

The results of the audit indicated that, in the period examined, 92 % of the patients were shadow billed to MSI. Of those claims shadow billed, 83% of the claims supported the MSI billing as submitted and, of the procedures submitted, 73% were appropriately billed.

Even with the recognition that many AFP contract services cannot be claimed the audit figures give serious concern, particularly if the same percentages apply to reciprocal billing claims which are a source of direct revenue to the Province.

ABCC provides to the Department of Health an "Alternate Funding Monitoring Report" which presents a quarterly breakdown of shadow billing claims by Department of Medicine physicians. This report details the shadow amount, the number of shadow services, the number of days which the services cover, and the number of individuals involved. This report provides information which could be of value if properly analyzed over a period of time. However, the Department of Health indicated that due to the limited staffing resources available, the report is cursorily reviewed and filed.

A review of the ABCC reports provided the following:
(Source: ABCC Annual Reports to the Department of Health)

Fiscal year	Shadow Billing Amount	AFP Payment Amount
2001-2002	$17,545,849	$21,856,572
2002-2003	17,746,976	22,176,699
2003-2004	20,456,124	29,980,384

It should be noted that the AFP Payment Amounts above should reflect the figures at the time and were not adjusted to reflect further retroactive payments made as a result of contract reconciliation or new physicians. Shadow billing amounts would not, however, change due to any retroactive payment adjustment for the time period.

Shadow billing amounts increased by 16.5% from the first to third year of the AFP while the actual payments, according to ABCC figures, increased by 36.8 %. Over the same period the FTE's within the AFP increased from 125.83 FTE's to 136.58 FTE's, an increase of 8.5 %.

As can be seen, payment amounts, taking into account the FTE increases, outpace the shadow billings totals.

There is currently no incentive, or disincentive, for physicians with respect to shadow billing. The result is that when shadow billing is not done it is likely that the shadow billing for reciprocal billing situations is likewise not being completed.

One possible solution to this situation is to remove the projected amounts from annual reciprocal billing from the annual Minister's funding for the AFP and allow the physicians to bill reciprocal service situations within the limits of the current article 3.9 of the AFP.

Recommendations

The Department of Health should ensure that the required resources are available to adequately monitor AFP shadow billings and analyze the ABCC reports. The Department of Health should ensure that the ABCC reports give enough detail on clinical work to determine if the AFP resources are contributing to healthcare improvements. The ABCC reports should be provided on a timely basis to ensure that the information being reviewed is relevant allowing for corrective action, if necessary.

Until a replacement information/performance management system is designed and implemented, compliance with shadow billing requirements by the Department of medicine, as defined in the contract, should be ensured, with payment transfers conditional upon compliance by all members of the AFP.

Rationale: A review of shadow billings confirmed that shadow billings, as a percentage of the Minister's funding, represented only an average of 68% over the term of the AFP. AFP partners should jointly address the design and development of an effective management information system to capture all AFP activities. Responsibility for monitoring shadow billings should be clearly established, until a new information/reporting/performance management system is in place.

All DOM shadow billings should be subject to a periodic risk analysis audit process by ABCC, similar to fee for service payments.

Rationale: DOH did not provide ABCC with a clear mandate for audit of shadow billing activities. This should be immediately addressed by DOH, and shadow billings subjected to the same rigorous audit/analysis processes so as to monitor productively more effectively.

At the time of renegotiating the AFP, AFP physicians should be required to bill Fee for Service for out of province patients. The Minister's funding should be reduced by the

projected amount of reciprocal billings for the contract period or on a per annum basis (for provinces other than Québec), taking in to account historical amounts and utilization. Reciprocal billings should then be moved to the provision of the AFP which deals with additional funding sources (current section 3.9).

Rationale: Notwithstanding that shadow billings is mandatory, interview information revealed that for a selected period, only 92% of patients were shadow billed, as well the same audit established that shadow billing was only 83% appropriately billed and 72% are complete. It is reasonable to assume that reciprocal billing would be similarly underreported with a resulting loss of revenue for the province.

4.2.2.2 CLINICAL WORKLOAD

The inability to indicate value for money based on comparisons between pre and post AFP clinical workload indicators has already been underlined in earlier sections of this Report. That is not to suggest, however, that data are not recorded and reported in a manner that provides the DOM with regular progress reports. Indeed, the Department employs an elaborate system of collecting clinical activity data from a variety of sources throughout the CDHA and uses this information effectively for purposes of both planning and evaluation.

During interviews with Division Heads, the audit team was constantly reminded of the usefulness of information provided by DOM administration and how essential it has been in performance evaluations and general divisional management. Work volumes and wait time statistics were considered to be of particular significance, as were the trend indicators.

While value for money comparisons could not be undertaken for the reasons stated earlier in this report, departmental clinical workload was examined over a four year period. Bed utilization figures are not reliable indicators of workload, given that bed allocations change and technological advances consistently move care toward outpatient procedures.

The following table provides an analytical summary produced by the DOM, outlining ambulatory activity for the years 1999-2004. Likewise, the related funded FTE positions are shown, although these numbers represent “slices in time” rather than necessarily the complement for the entire year.

It is obvious that the DOM is an extremely busy department and its specialists very much in demand. While the figures shown reflect a change in staff complement consistent with growth in patient services, the audit team did not arrived at any conclusions in this regard. To do so would require a lengthy and thorough analysis of each of the various divisional components within the Department and a determination of the relative complexity and time factors associated with the many clinical procedures involved.

Registration Data for Ambulatory Care Services
Dept of Medicine Clinic Teams - Registrations to All Care Providers

Division	Section	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004
Cardiology	Cardiac Devices	1,445	1,541	2,855	3,210	3,424
	Cardiology	14,098	16,430	16,970	17,259	17,213
	Cardiology Heart Health	1,292	1,198	966	1,128	842
	Cardiology Med Day Unit	21	27	23	20	11
	Cardiology Other	61	43	44	34	59
	Cardiology Pre Admit	2,383	1,917	2,364	2,383	2,696
	Cardiac Investigation	250	338	210	192	226
	Cardiac Investigation Devices	15	15	18	26	14
	Cardiac Investigation ECG	4,405	4,377	3,526	3,668	3,300
	Cardiac Investigation Echo	6,309	5,922	4,471	4,167	5,316
	Cardiac Investigation Holter	2,213	1,886	1,777	1,458	1,077
	Cardiac Investigation Pacemake	1,127	1,048	7	0	0
	Cardiac Investigation Stress	4,661	4,984	5,136	5,483	5,486
Total Cardiology		38,280	39,726	38,367	39,028	39,664
Dermatology	Dermatology	5,377	5,873	5,840	5,898	5,025
	Dermatology Other	182	148	155	221	233
	Dermatology Treatment	5,313	5,613	5,464	2,859	1,960
	Dermatology Treatment Ingersol	0	0	2,302	6,726	10,323
	DermPhoto	0	0	37	252	262
Total Dermatology		10,872	11,634	13,798	15,956	17,803
Endocrinology	Endocrinology	6,216	6,315	7,031	7,456	7,056
	Endocrinology Heart Health	261	395	367	420	440
	Endocrinology Other	7	14	6	1	0
	Diabetes	6,724	6,318	6,481	7,809	8,095
Total Endocrinology		13,208	13,042	13,885	15,686	15,591
Geriatric Medicine	Geriatric Day Hospital	2,333	2,651	2,318	3,302	3,267
	Geriatric Medicine	1,711	1,585	1,436	1,588	1,787
Total Geriatric Medicine		4,044	4,236	3,754	4,890	5,054
Gastroenterology	GI Enterostomal	388	433	319	468	460
	GI General	7,266	6,825	7,390	8,557	9,603
	GI Home Pen	145	137	114	59	37
	GI Liver Transplant	0	0	0	281	285
	GI Other	723	521	629	740	739
	GI Preliver Transplant	0	0	0	196	264
	GI Rapid Consult	286	22	0	0	0
	GI Endoscopy -HI	622	434	375	373	389
	GI Endoscopy -VG	4,181	4,568	5,004	4,980	5,153
Total Gastroenterology		13,611	12,940	13,831	15,654	16,930
General Internal Medicine	General Medicine General	2,131	2,250	2,175	2,170	2,598
	General Medicine Heart Failure	77	398	564	680	721
	General Medicine Hypertension	805	1,596	1,822	2,627	2,585
	General Medicine Immunology	684	651	682	648	317
	GM Other	418	613	514	570	472
Total General Internal Medicine		4,115	5,508	5,757	6,695	6,693

Division	Section	1999-2000	2000-2001	2001-2002	2002-2003	2003-2004
Hematology	Haematology	5,488	5,593	5,911	6,657	7,309
	Haematology MDU	4,575	5,584	6,065	6,853	7,354
	Haematology Other	66	219	134	111	83
Total Hematology		10,129	11,396	12,110	13,621	14,746
Infectious Diseases	Infectious Diseases	678	815	884	1,072	1,076
	Infectious Diseases Other	357	180	230	170	155
	Infectious Diseases Special	1,236	1,205	1,020	882	966
	Infectious Diseases STD	1,253	1,214	1,196	1,574	1,313
Total Infectious Diseases		3,524	3,414	3,330	3,698	3,510
Medical Oncology	Medical Oncology Cancer Clinic	n/a	10,430	12,883	14,058	13,103
Total Medical Oncology			10,430	12,883	14,058	13,103
Neurology	Neurology	3,440	3,856	3,935	4,608	5,292
	Neurology MDU	360	376	208	259	294
	Neurology Other	0	21	24	34	13
	Neuro-ophthalmology	578	483	518	421	404
	NED Unit	3,674	3,549	3,367	3,443	3,186
Total Neurology		8,052	8,285	8,052	8,765	9,189
Nephrology	Nephrology	2,861	3,117	3,292	3,594	4,130
	Nephrology Med Day	338	458	496	484	543
	Nephrology Other	5	63	67	24	64
	Renal Transplant	1,454	1,642	1,505	1,207	1,485
	Dialysis	28,047	29,813	32,923	33,550	35,926
Total Nephrology		32,705	35,093	38,283	38,859	42,148
Palliative Care	Palliative Care	4,607	4,911	3,376	3,686	3,000
	Palliative Care	n/a	1,226	1,335	642	835
Total Palliative Care		4,607	6,137	4,711	4,328	3,835
Physical Medicine and Rehabilitation	Physical Medicine and Rehabilitation	2,539	2,317	2,194	1,909	2,312
		769	1,089	1,036	1,163	6,042
Total Physical Medicine and Rehabilitation		3,308	3,406	3,230	3,072	8,354
Rheumatology	Lupus	141	155	144	134	14
	MDU Rheumatology	88	180	305	330	271
	PF Rheumatology	0	44	41	42	52
	Rheumatolgy Injection	704	578	410	392	273
	Rheumatology	5,414	6,069	5,743	6,074	6,878
Total Rheumatology		6,347	7,026	6,643	6,972	7,488
Respirology	Respirology	3,017	3,301	3,726	4,003	4,076
	Respirology Other	242	208	179	167	152
	Respirology	190	75	1	4	0
	Respirology Hyperbaric	532	599	660	666	388
	Respirology Pulmonary	3,947	4,425	4,759	4,875	4,888
	Respirology Sleep Lab	0	182	222	551	651
Total Respirology		7,928	8,790	9,547	10,266	10,155
Total Department of Medicine		160,730	181,063	188,181	201,548	214,263
Funded FTEs		**109.55**	**112.85**	**125.83**	**132.08**	**136.58**

4.2.2.3 INFORMATION SYSTEMS

The collection of reliable and timely information on clinical and academic activities is integral to the operational effectiveness of the Department of Medicine and of the health care system as a whole. This section of the audit report will refer to the reporting systems as they now exist, comment on their ability to respond to stakeholders' needs and expectations, make observations on deficiencies and consequences thereof, and present recommendations on necessary improvements.

The DOM has demonstrated very clearly that it considers management information to be absolutely essential to its success as a department and to demonstrate its productivity and quality of services. It is to be highly commended for the steps it has taken in this regard. Audit team interviews with Division Heads, for instance, have shown universal adoption and utilization of information provided by DOM administration as part of divisional performance assessments, self audit, examination of wait times and regular evaluation of physicians as part of the individual practice plan arrangements. The degree of attention paid to these management practice endeavors is quite remarkable, given the absence of constraints that formerly existed under fee-for-service.

Despite its good intentions, the DOM continues to function under a burden of a larger institutional data collection system which is seriously flawed. It would be inappropriate to comment on the DOM information process without enjoining the CDHA system as part of the audit assessment.

The audit team's interviews with senior executives at CDHA have confirmed that the absence of a comprehensive and reliable patient information system represents a major impediment in efforts to manage and report effectively in all areas of their responsibility, including patient care. The April 2004 report "***Towards the Future: Information Management Strategic Plan: 2002-2007***" states:

> "Expectations of clinicians, patients, families, communities and health system managers are creating great pressure to improve health decisions through better and timelier access to information. Healthcare is a very information-intensive business. Without timely, accurate and appropriate information, it is difficult for those involved in health to make effective and informed decisions." [our emphasis]

The plan then proceeds to outline a strategic direction for improving patient care, access to and quality of information for patients, providers, communities, clinical and management decision-making, education and research. The report then makes a series of implied recommendations.

The audit team's documentation review included material from a variety of sources - DOM, CDHA, billing clerks, information officers and physician managers. What is striking is the large

number of systems currently in place to collect and report data. There are in excess of 35 patient-related information systems currently in use, along with a host of other systems dedicated to administrative applications.

Despite this substantial investment in systems and personnel, significant reporting gaps and major integration problems remain. For example: in-patient consult visits are not recorded if the patient seen is not under the specific care of a sub-specialist. Ambulatory visits are not diagnostic coded. Ambulatory registrations are not fully documented, especially after hours and on weekends. Neither are telephone consults and tele-health encounters. Renal and home dialysis are not fully registered, nor are palliative care home visits or addiction services. Cancer care treatments are not registered in STAR; neither are mobile crisis intervention activities.

The DOM, to its credit, attempts to compensate for these deficiencies through a collection of its own initiatives-data recorded by Divisions, physician secretaries, ward clerks and others. The majority of this information is collected and transmitted on a manual basis, with all the attending opportunity for error. Because of the substantial reliance on hard copy vs. digital information, prompt access is often compromised, which brings into question the ability to optimize patient care delivery. It also represents a substantial cost factor.

A prime example of the seriousness of incomplete information can be found in the reporting of wait times. Under the " ***Report of the Provincial Wait Times Monitoring Project Steering Committee-January 2004"***, wait times are defined as the number of days from the date the referral is received by the specialist to the date the patient is seen. In the team's opinion, this definition is incomplete in that it ignores the patients who have been referred and still "waiting" to be seen. The DOM, because of its inability to easily factor these unseen patients into its calculations, excludes them, thereby understating actual wait times. These wait time results are reported both internally and externally as DOH statistics. Furthermore, they are used to assess departmental, divisional and individual physician performance.

The AFP enables direct patient intervention by physician extenders and clinical associates. Inasmuch as there is no system of coding these work activities, the DOM relies on manual recording and reporting which leads to the possibility of work actually performed being understated when analyzing for value for money. Neither is the cost of these individuals reported separately, an important element when making the same assessment.

The AFP requires the DOM to record and report on academic activities. It is unable to fully comply because of system and resource limitations. In the absence of complete and comprehensive performance indicators, and supporting management information systems, the DOM will continue to be deficient in accurately reporting even when performance deliverables have been defined.

Recommendations

A reporting system should be developed which recognizes the full range of activities undertaken under the AFP, including the roles of physician extenders, clinical nurse specialists, etc., in providing team-based patient care. The costs, as well as the benefits, of these services should be identified in conjunction with the development of the AFP funding package.

Rationale: AFPs were designed to promote new approaches to providing patient care, which included telephone consultations, telehealth, physician extenders, clinical nurse specialists, more direct interface with community physicians, etc. This new team based practice style has not yet be fully recognized and reported, thereby making meaningful performance comparisons with FFS activities impossible. Costs associated with these services must form part of any value for money analysis. Existing FFS billing (shadow billing) does not capture any of the activities of these providers.

DOH, in conjunction with CDHA, should undertake a thorough analysis of the patient information systems currently employed at CDHA. Such analysis should include a summary of all the existing components, the associated costs, and ability to integrate etc.

That the AFP parties should develop a standardized information system to collect AFP information.

Rationale: At the moment, there are in excess of 35 separate systems in place at CDHA which collect patient information. Some of these are sizeable in nature, providing discrete data – e.g. STAR which deals with registration and bed utilization and PHIS, which handles ambulatory scheduling and bookings. At the same time, the majority of Divisions within the DOM add to the process by independently recording patient activity indicators for internal DOM reporting and performance analysis. Throughout, there is no evidence of the CDHA's ability to entirely reconcile its own data and that of DOM although efforts are underway to do so.

In any event, the existing system is fragmented, duplicative and expensive. A complete and thorough analysis is called for.

The parties are reminded that, in accordance with section 6.2, the deliverables and evaluation system will include the data requirement and reporting mechanisms required by the parties.

4.2.2.4 ANALYSIS OF AFP OVERHEAD COSTS

Under Section 7.0 and 8.0 of the AFP, the parties agreed to the amount of annual overhead support to be provided to the DOM by: a] Dalhousie University and b] the Capital District Health Authority. The main obligations are as follows:

Dalhousie University

- 7.1.1 An annual University budget envelope of $2.5 million from the Dean of Medicine's Resource Allocation Model ["RAM"] or such larger results as the RAM shall allocate from time to time.
- 7.1.2 An annual allocation of the Dean of Medicine's Clinical Academic Budget ["CAB"] as determined by the formula used by the Dean of Medicine to allocate this available funding to Departments in the Faculty of Medicine.

CDHA

- 8.3.1 Administrative and non-clinical medical service delivery funding to the Department in the amount of $4,202,200 per annum (see Section "G" for details)….
- 8.7 …..For each new approved FTE District based physician….the District will fund the Department $20,000 per annum and allocate a one-time $5,000 expenditure for office set up and equipment upon appointment. Each new community based physician will be funded the amount of $2,000 per annum…..

Both Dalhousie and the CDHA have contracted to provide physician offices, lab facilities and teaching space.

It should be noted that, while the AFP refers to "funding" in describing overhead support obligations, there are no direct payments as such. Dalhousie and Capital Health absorb costs associated with the DOM and issue monthly reports to the Department of Medicine outlining the totals and the agreed upon cost distribution information. These totals are then recorded on the books of the DOM for reporting purposes.

In the audit team's review of overheads associated with the DOM administration, it was advised that the AFP contract requirements were fairly well complied with. Under-expenditures

frequently occurred when staff vacancies arose or delays took place in recruiting for administrative positions and budgeted costs failed to materialize to the degree forecasted.

There are several areas of dispute, however, one relating to AFP contract interpretation and the other one involving funding approvals and a serious lack of agreement among the DOM, CDHA and DOH. The AFP designates specific dollar amounts toward overhead support. The DOH considers this to be a fixed amount for the duration of the contract. The DOM assumes that, over the three years of the life of the contract, upward adjustments will apply for increases in labor contracts and other inflationary considerations. This matter obviously must be resolved through documented agreement among the parties.

The second matter in dispute involves the clerical support for new physician recruits. The CDHA is working on the premise that when a new approved position is filled, the DOH will adjust its budget upwards for the clerical costs described in Section 8.7 of the AFP. The CDHA will then pass on this increase in its overhead allocation to the DOM. The CDHA states that the DOH is delinquent in this regard and until such time as the additional funding is approved, no increase will be passed on to the DOM. At the moment, the un-funded positions amount to approximately 4.5 FTE's and the DOM is extremely concerned that it is unable to fulfill its obligations to the physicians involved. The parties must agree to an effective process for resolving these disputes and utilize the opportunity to do so within the provisions of the Governance Committee structure. Future AFP contracts should be clear with respect ot overhead and administrative support provided.

One of the inherent contributors to this problem is the timing of annual budget approvals for CDHA. As of the writing of this report, Capital Health has not yet received its overall budget approval for the current fiscal year, which causes serious problems with respect to its financial management requirements.

4.2.2.5 COMPARISON WITH OTHER AFPS

During fiscal year 2004-2005 the Department of Health has alternative funding contracts with 23 medical groups. There are also five General Practitioner contracts which are not group contracts and will not be examined in this review.

The size of the groups covered range from an AFP including two physicians to the Department of Medicine AFP, the largest, covering 131 FTEs. The combined AFPs have an approved complement of 592 FTEs for this fiscal year which, if all FTEs are recruited, would result in a total dollar value of $146.5 million for this fiscal year.

None of the current AFPs has clear deliverables and all of them rely on shadow billing as the measurement to be used. Only the Department of Medicine has a "Deliverables & Accountability

Framework" against which a formal reporting is made and it is currently only the Department of Medicine that has produced an annual report of its activities and achievements.

The team was advised that one of the academic AFPs being renewed contains deliverables but as agreement had not been reached at the time of writing this report the team was unable to review the deliverables.

The level of administrative support to be provided by the Hospital or District varies greatly among the AFPs but none has the detail or amount of support contained within the Department of Medicine. Similarly, the academic support is not spelled out in other AFPs to the degree that it is in the Department of Medicine AFP.

As such the Department of Medicine AFP is the most comprehensive and largest AFP managed by the Department of Health.

The audit team is of the opinion that considerable economies of scale and administrative ease can be achieved through the combining of all, or a number, of the current academic AFPs.

Recommendation:

The Department of Health should consider implementing an Omnibus AFP for the Dalhousie Faculty of Medicine, containing separate funding provisions for various specialties, but ensuring common administrative support, relevant academic support, common managerial provisions and deliverables applicable to each specialty area.

4.2.2.6 COMPARISON ACROSS CANADA

Introduction

The DOM AFP audit project plan included an interprovincial/territorial comparison of AFPs to gain a better understanding of what the challenges and issues associated with alternative funding mechanisms have been in other jurisdictions. The methodology adopted for this component of the study is described below:

Approach and Methodology

The first step involved a review of literature and documentation on alternative payment mechanisms in Canada, and, to a more limited degree, in international jurisdictions, such as the United Kingdom and the U.S. This comprised a review of provincial/territorial departments/ministries of health web-sites for reports on alternative funding systems; review of relevant provincial Auditor General Reports on alternative funding; review of CIHI reports and documentation on alternative funding systems. Following that literature/documentation review,

all provinces and territories were contacted by email [the contact list was provided by Physician Services Branch of NSDOH] introducing the audit project and describing information needs for the interprovincial/territorial comparison. Emails were followed up by a 5-10 minute telephone call to the most appropriate respondent able to provide detailed information on the scope and requirements of the study. All respondents agreed to take part, and were subsequently sent a written questionnaire. A 45-60 minute telephone interview then took place at a designated time, whereby respondents answered the questions provided to them in advance. Some respondents provided additional information and reports by email. Several respondents were contacted again for clarification or further information.

The section below is a summary of information provided from all of the above sources. The focus of the information collected was on alternative funding plans for specialists and academic specialists. Table 5 at the end of this Section provides a summary of the data collected. The list of respondents is provided in Appendix A.

The project team would like to acknowledge the kind cooperation of the provincial and territorial officials who generously gave of their time and insights. All expressed an interest in sharing information nationally, and in the importance of building on each other's experience in the management of alternative funding systems.

The interprovincial/territorial scan demonstrated that some form of alternative payment system exists in most Canadian provinces and territories. Fee-for-service, however, continues to be the dominant form of payment to physicians in Canada. CIHI reports that approximately 11% of total payment to physicians were in the form of alternative payment systems in 2001. Nova Scotia and Newfoundland have the highest number of APPs as a percentage of total funding to physicians, with Manitoba and PEI following. [CIHI 2003 ***Health Care in Canada***]. Trends indicate an increase in the number of APPs negotiated with physicians and medical associations, with Alberta expecting to achieve 50% of its physicians on alternative payment plans (2002 ***Alberta Government Response to the Mazankowski Report***). The Ministry of Health of Ontario provided new base funding for its Academic Health Sciences Centres in 2000 to support APPs.

A summary of information collected from all provincial and territorial governments is provided in the next section.

New Brunswick

New Brunswick does not have "AFPs" per se, but uses the salary model. 250 physicians are currently on salary schemes (out of a total of 1, 200). There are four salary scales:

General Physicians - up to $130,000
Non-certified physician specialists - up to $165,000

Specialists – to $186,000
Department heads - to $199,000

Regional authorities recruit and pay these physicians, and are then reimbursed by the MOH. Social benefits are also paid, or an additional 10% of the salary. The contract negotiations are coming up this fall for these four groups. Physicians in New Brunswick are offered a choice of FFS or salary.

There are approximately 15 physicians outside of the regional medical remuneration scheme on special agreements. There are also other models, which may include a base salary, e.g. pediatricians receiving a salary of $220,000 plus 4%.

[Ref. NB Ministry of Health and Wellness web site www.gnb.ca/0394/prw/Remuneration-e.asp#SPSL]

Manitoba

Manitoba has a broad system of AFPs. The term AFP is used to denote any funding system which is not FFS; many types of payment mechanisms are used, such as sessional fees, stipends, independent contractor contracts, salary, top ups, blended payment, block funding, etc. Almost all physicians in Manitoba receive some type of additional funding. There are approximately 60 different AFPs contracts, with different deliverables, different payment structures (e.g. pediatrics, nuclear medicine, family medicine, on call coverage, pathology). The breakdown of AFP: FFS is approximately 40:60.

AFPs are considered methods for solving certain types of problems, such as non-competitive incomes, or where volumes of patients do not allow physicians to practice.

Deliverables are considered a problem. Often, these are service based (e.g. for salaries, 8 hours/day for 220 days/year). However, DOH cannot stipulate specific hours of work. The Ministry is considering moving towards health outcome indicators, but this is complex to undertake and requires sophisticated information systems. AFP physicians are requested to complete shadow billing, but this not really done, and it is not a good way of managing services. DOH does not enforce this as the Medical Society would retort with a request for additional funding to collect information.

Academic AFPs – DOH does not assess level of services nor assign target patient numbers. It leaves it to the RHA to manage productivity. It is the belief that the RHA should manage AFPs and productivity, as the RHA is “closer to what’s going on” than the DOH.

Wait lists are considered artificial concepts, as these can be manipulated to mean everything and nothing. Patients on the wait lists are not always appropriate.

Saskatchewan

Saskatchewan uses both AFPs and APPs (the terms seem to be used interchangeably, with AFP being the more current term). A significant number of physicians are on APP/AFPs. Alternative payment plans are transfers based on past FFS activity, where funds are usually added, contracted with a physician. Both GPs and Specialists have APPs. APPs may also have an academic component.

Examples of APPs are Northern Medical Services (for remote rural areas, usually fly-ins), Pediatrics at University of Saskatchewan in Saskatoon, Neurosurgery, Clinical Keratology, Obstetrical Anaesthesia.

APP/AFPs are driven by interest on the part of physicians in moving away from FFS, usually younger graduates more interested in stability and security. This system also helps in recruiting physicians to Saskatchewan. AFPs are not considered a mechanism to reduce medical services costs; in fact, they are seen to be more costly that FFS, in general. Many specialists are on AFPs and many community based specialists, as well.

Management of AFPs is an on-going problem and concern. All provinces are seen to face the same accountability issue. Shadow billing is still in use, but not fully complied with. One department, obstetrical anesthesia, was awarded an increase as a result of being able to demonstrate increased volumes tracked through shadow billing. It complied very meticulously with shadow billing. The MOH has cancelled some agreements because they were not demonstrated to be cost-effective, referral patterns had changed and shadow billing showed a decrease in volume.

Primary Care Services uses activity codes which track non-FFS activities (such as consultations with other physicians, time spent with patients' families), work with Advanced Clinical Nurses.

Altogether, there is huge pressure to develop more AFPs. There are not good sources of information upon which to plan. AFP costs are usually in excess of FFS.

CIHI has been pushing for more information, including shadow billings and AFPs. There is a concern that if shadow billing is done away with, Saskatchewan's ability to track disease for health information systems will be compromised.

Québec

Québec seems to have given much thought and consideration to AFPs ("Blended mode" in Québec) and their management. Financial incentives have been carefully established and are closely monitored. "Corrective action" can be introduced. There is a thick document of guidelines, rules and regulations to govern the negotiation, implementation and evaluation of AFPs' on the Régie de l'assurance maladie du Québec website. Currently, 50% of all surgical and medical specialists are on AFPs – physicians cannot opt out, it's an all or nothing situation; either an entire department is in or it is out. To change back to a FFS system, all physicians must agree and this can only be done on the contract "anniversary date". AFPs were introduced in 1999.

There are detailed algorithms for the calculation of payment systems. The volume of activity under FFS is analysed, and projections made.

A formula determines the exact volume of work to be done by each physician, as follows:

a) Hospital work:
   on week days:
   - regular hours: mixed mode
   - other hours: fee for service
   on other days:
   - fee for service

b) Private clinic:
   - fee for service

The sessional fee is the same for all the specialties. It is equivalent to a payment of a per diem of $670 per day of activity. A day of activity corresponds to an average period of 7 hours of activity in an hospital for the activities identified in the "annex 38" of the agreement (see website link below) and these hours of activity carried out 7 AM to 5 PM during weekdays, with the exception of public holidays. The estimated days of work a year is 220 (x $670). Physicians in Québec AFPs can also bill under the FFS system, after hours or on weekends. They receive about 30% of the cost of the service during regular hours, but 100% after 5 PM, and receive an additional amount (125%) to provide service on weekends. There are adjustments to the payment in view of the "complexity" and time intensity of certain specialty areas (e.g. pediatrics).

Some additional benefits are provided to physicians under the blended mode of payment, such as continuing education, and on call benefits.

The funding is intended to cover clinical services, clinical teaching, clinical administration, but not formal teaching. Québec is aware that Dalhousie AFP includes teaching, and there has been

some pressure to move in that direction, but they were not able to arrive at un understanding with the universities and with the Ministry of Education.

Billings based on FFS codes are submitted and payment is conditional upon them. These are tracked and monitored very closely (must include patient's number, diagnosis, and treatment). This information is essential for the physician to receive payment. It is expected that physicians will be present on site for 7 hours/day. Ste Justine Hospital in Montréal is trying to negotiate a lump sum payment (like Dalhousie DOM), but this is not yet a reality. Québec's specialists earn substantially less than counterparts in other provinces, and this gap is growing, but the MHSS is committed to controlling expenditures.
http://www.ramq.gouv.qc.ca/fr/professionnels/manuels/158/000_complet_rem_mixte_spec.pdf

See control mechanisms in Guidebook, brochure #1, 120-121.

Alberta

Alberta's definition of terms is as follows:

> APPs (Alternative Payment Plans), which are replacement for traditional FFS billings;
> AFP – used to mean APPs, plus a grant for the academic portion of specialists' work; and,
> ARP (Academic Alternative Relationships Plans), the new term for AFPs.

In Alberta, there is a Trilateral Agreement or a Master Agreement between the Alberta Government (Department of Health and Wellness), the Medical Association and the Regional Health Authorities. The purpose of this Trilateral Agreement is to find a way to manage the budget for medical services, and for all parties to work together in budgeting, managing the agreements, and guiding relationships with physicians.

The Alternative Relationship Branch has three types of agreements:

1. Local PHC initiatives. It receives proposals to fund local PHC initiatives, and manages payments to physicians;
2. ARP – for clinical services; and,
3. Academic Medicine – this division "tops up" payments to specialists who are university based, and who receive ARPs for clinical services. Academic ARPs only fund the teaching and research work. Approval of academic ARPs does not go to the Trilateral Committee.

Currently, the following departments have academic ARPs:

Neurosurgery (Edmonton and Calgary) has been in place for 3 years and will be renegotiated [21 physicians];
Pediatrics (Edmonton and Calgary) [69 and 57];
Medicine (Edmonton and Calgary) [116 physicians]; and,
There are also proposals for Family Medicine (Edmonton) and Neurology (University of Calgary) (Neurology at U of C is part of Neurosciences Faculty).

Funding for Academic ARPs is currently on a proposal by proposal basis. The division is working on developing a collaborative vision. There is also no established baseline funding out of the divisional budget. Thus, there is a separation between APP – for clinical services and Academic ARPs – for research and teaching. APPs are not focused on the academic component.

APPs include both full time and part time specialists, as well as sessional contracts, and individual letters of participation are signed with specialists. APPs are calculated using averages for FFS billings. The Trilateral Committee establishes salary rates, based on billable earning of specialists. The Academic grants portion of the ARP is funded by the Department of Health, and there are discussions with the Department of Education to develop a vision for academic medicine.

Work is underway to strengthen the evaluation component of ARPs. The Auditor General's Report was critical of AFPs – funding for academic medicine from multiple sources was seen as having weak accountability; more transparency and accountability were called for.

The University of Alberta Faculty of Medicine ARP is currently being evaluated, and an interim report has been submitted. The final report is expected next spring. This evaluation is examining the impact of ARPs in Alberta, in terms of:

- Recruitment/retention
- Clinical services innovation
- Accessibility
- Medical education
- Research
- Governance

There is an Evaluation Committee set up for each AFP. It is planned that future ARPs will include an evaluation framework. The goals will be defined, and these must be related to the goals of Alberta Health and Wellness and the Mazankowki Report. Expected outcomes include: accountability, acceptability, appropriateness, effectiveness, efficiency and safety. Performance measurement indicators are specifically developed by each division and related to DOH goals.

In terms of information systems for ARPs , currently, FFS shadow billings are still being utilised, but it is expected that once a better system is designed, they will be phased out. Information is currently drawn from the Regional Data Base, Alberta Health, physicians office support systems Alberta is exploring alternative workload management systems, and also examining coding and how procedures are coded. Compliance is an issue (neurosurgery has never submitted any shadow billing, although it has had a contract since 2001 and shadow billing is mandatory). The DOH monitors AFP performance, receives quarterly and annual reports. The term used to describe a clinical service is "service event report". Deliverables are described in the contract as service agreements, describing what programs are to be delivered, the size of the population served, the innovations plans, and expected outcomes. These are also detailed in the proposal.

The Master Agreement is being renegotiated, and the AFP templates are being redesigned.

Ontario

Alternative payment or funding plans (APP/AFPs) are seen by the Province of Ontario as providing flexibility in practice styles, encouraging co-ordination and integration of medical services, improving compensation for highly specialized groups, and assisting with retention and recruitment of physicians.

Additionally, AP/AFA/AFP contracts can assist the health care system by:

- ensuring service provision in underserviced areas and high risk populations; and,
- promoting predictability and accountability in health care funding.

AFPs have also been credited with promoting a greater understanding and improved relationships among hospitals and physicians through shared business plans.

The Ministry of Health and Long-Term Care is currently examining the feasibility of establishing an Alternative Funding Plan (AFP) in each of the four Academic Health Science Centres (AHSCs) in Hamilton, London, Ottawa and Toronto. Kingston has already established an AFP - South Eastern Academic Medical Organization (SEAMO).

AHSCs are an alliance among hospitals, university and medical staff, which are both referral centres and centres of excellence in specialized clinical services; they teach medical students and they conduct medical research.

An AFP provides an alternative approach to funding physician services through fee-for-service. An AHSC AFP is an agreement between physicians, the hospital, the university, the Ontario Medical Association and the Ministry of Health and Long-Term Care. The scope of services,

deliverables, decision-making, reporting and accountability structure is defined within the agreement.

There are different models of AFPs in Ontario. One AFP covers the services of all full-time specialists at an Academic Health Science Centre. Still others cover the entire services of all physicians at a hospital. Examples of these models are two Children's Hospitals. Some are for individual departments at a single hospital, like Paediatrics. Others include province-wide AFPs, e.g., gynae-onccology, paediatrics, radiation and medical oncology. Comprehensive AFPs cover all full time specialists for clinical, teaching and research at an Academic Health Sciences Centre, including 3 hospitals. Hospital-based AFPs fund all paediatric and paediatric related specialties and sub-specialties. There are also individual departmental AFPs, which include Neonatalology, Regional Geriatric Programs, Perinatalogy, Paediatrics, Neurosurgery, Community Pain Program, and several others.

The majority of these agreements have been negotiated, signed, and implemented within the past four years, but some are older:

- Comprehensive AFP - first negotiated in 1994;
- Hospital-based AFPs signed in 2001 and 2002;
- Regional geriatric program created over 10 years ago but recently renegotiated; and,
- Provincial programs were negotiated in the last 2-4 years.

Indicators are being used to assess productivity and performance. AFP contracts are becoming more standardized, with improved accountability and reporting requirements. These have now identified benchmarks and deliverables for required assessments and evaluation. Examples of accountability element/requirements in these contracts include the following:

- a floor on the number of full-time physicians and the amount of time they devote to in-scope services (i.e. Full-time physicians work at least 45 hours/week, major part-time at least 22.5 hours/week);
- a requirement for specific reports outlining clinical, teaching and research activities;
- a requirement to shadow bill all clinical services within the scope of the agreement;
- a requirement for indirect service reporting; a requirement for audited financial reports;
- a requirement for the development and approval of an annual business plan, human resources plan and a notional allocation plan linked to the hospital's annual operating plan;
- a requirement for increased clinical services to access bonus funding annually;
- funding linked to physician recruitment; and,
- provision for the reduction or recovery of funding should there be more than a 5% reduction in the minimum number of full-time or major part-time physicians, or if the

level of clinical services provided by full-time or major part-time physicians falls, on average, below 33 hours per week in any funding year.

Academic Comprehensive plans include the comprehensive and hospital-wide AFPs. These are large programs that cover clinical, teaching and research within specific academic hospitals. These currently include 972 FT and PT Specialists (310 PT; 662 FT).

Academic Specialists include individual department AFPs (multi-specialty agreements including geriatrics, neonatal, neurosurgery, paediatrics, pain clinic and perinatal services). There are currently 284 FT and PT Specialists (157 PT; 127 FT).

There are also province-wide programs, academic and/or province-wide programs for radiation, paediatric, medical and gynaecology services. These include 345 FT and PT Specialists (5PT; 340 FT).

An audit of the Alternate Payment Programs Branch was carried in 1996 by the Provincial Auditor General. Since then the Branch has worked to improve the development and administration of AFP contracts.

[Ref. For addition al information
http://www.queensu.ca/secretariat/senate/committe/other/seamo.html)
<http://www.queensu.ca/secretariat/senate/committe/other/seamo.html)]

British Columbia

British Columbia does not have alternative funding plans; it has an Alternative Payments Program (APP), which provides funding to the province's six health authorities for their payment of physicians' clinical services. There are APP arrangements (contracted services, sessions and salaries) throughout the province. The APP currently funds clinical programs at BC's tertiary teaching hospitals. Tertiary university-based specialists are funded primarily through salaried agreements with the health authorities and hospitals. However, the APP currently does not include alternative funding plans in the sense of global departmental funding that spans all clinical, academic and research activities.

The Ministry of Health Services (MOHS) is committed to alternative payment mechanisms, introducing APPs in 1968. Alternative payment mechanisms are seen to have the potential to provide for better quality of care, cost predictability, and enhanced accountability [ref. BC Auditor General's Report]. There are three main models of alternative payments between British Columbia's health authorities and physicians: service-based contracts; time-based sessional contracts (with standard rates for a 3.5 hour session of physician service); and salaried employment agreements. The APP establishes various funding contracts (service agreements)

and sessional funding arrangements with the health authorities; however, it is the health authorities, not the APP, that determine whether a service or sessional physician contract or a salaried arrangement is the better fit to support physicians in their delivery of the APP-funded services.

The APP funds a range of physician services, including but not limited to, psychiatry, oncology, pediatrics, geriatrics, emergency medicine and community health. Two thirds of APP funding is delivered through the Provincial Health Services Authority (for programs that have a provincial scope, such as the British Columbia Cancer Agency, British Columbia Children and Women's Health Centre, and British Columbia Transplant Society) and the Vancouver Coastal Health Authority. APP-funded services are delivered through contracts negotiated between the funded health authority or agency and an individual physician or physician group. All publicly funded contracts and physician compensation are subject to the provisions of the provincial agreements with the British Columbia Medical Association, including three agreements specific to service, sessional and salaried physician compensation.

In 2002/03, 2,282 physicians, including 1205 specialists, received all or part of their income from the APP via the health authorities. The APP does not pay physicians directly. APP arrangements have grown steadily in British Columbia, and accounted for approximately $300M during FY 02/03.

The MOHS requires encounter reporting (also called shadow billing) for all APP-funded services and recently established electronic submission using the existing electronic FFS claims system to improve reporting compliance and ease. An encounter report uses the same information fields as a FFS claim but with a zero billing amount.

Newfoundland/Labrador

APPs evolved out of FFS billings. At the outset, base funding was set based on the last fiscal year, the sum total added, which provided the base. Percentage increases awarded to FFS services were also added to APPs. If a department is short staffed, funds were also sometimes added to top up the APP.

Instead of the FFS model of billing for individual services, APP provided payment for time worked. The exception is cardiac surgery, which gets a regular bi-weekly payment – these specialists have to complete a certain number of cases (there is a target volume set) and a financial adjustment if they exceed or do not meet the target.

Newfoundland does not include funding for research or teaching as part of its APP (there are no "AFPs"). Payments are made only for insured medical services.

There are currently two types of APPs in Newfoundland. One is a rural plan – in anaesthesia in Central Newfoundland (Grand Falls), where salary and FFS amounts were pooled to provide coverage at a regional hospital. The rest of the APPs are contracted with teaching hospitals and include the following specialty areas:

Cardiac Surgery (3 FTEs)
Pediatric Orthopaedics (3 FTEs)
Pediatric Anaesthesia (4 FTEs)
Pediatric Surgery (2 FTEs)
Neonatology (5 FTEs).

In these cases, the APP is the principal source of income, but physicians can still bill FFS, as long as they are not duplicating billings. There is also a fee for time worked arrangement with Obstetric Anaesthesiology (to ensure 24 hour coverage), which is based on an hourly rate, and when not on call, the physicians can bill under FFS. Obstetricians have a similar arrangement.

The positive side of APPs has enabled Newfoundland to retain an adequate number of subspecialists (especially pediatricians), and thus have improved local access to these services. Recruitment and retention has improved. However, the MOH does not know if physicians are doing more. Likewise it is not certain that costs are being contained, but in Newfoundland/Labrador one should compare with the cost of sending patients out of province to obtain treatment.

Newfoundland does not use shadow billing. APPs are managed by RHAs, which best know their clinical needs with respect to coverage and access, and monitor staffing for clinics. Payment is made by MOH (as of April 2000 – prior to that, the Medical Care Commission, a public body outside of the Ministry, and which reported to the Minister, was responsible for payments). It was considered advantageous to have the payment agency at arm's length from government and far from perceived "political interference".

The trend to APPs has slowed down, but has not come to a halt. Neonatology was the first APP in 1999, and the emphasis has been on the pediatric side, which is now covered. There have been preliminary discussions with other groups, but the income spread is so "enormous" between the highest and lowest earners under FFS, that a resolution is not foreseen in the near future.

Yukon Territories

There are only APPs in the Yukon for medical services. There are currently six separate arrangements:

4 with specialists (2 OB/GYN, 1 internal medicine, 1 psychiatry)

2 GP's in rural areas.

The specialists are housed in hospitals and pay $1.00 rent per year for use of the premises. There are also additional bonus, such as vacation, long-term disability, moving allowance, retention bonuses, and others.

All physicians are required to submit shadow billings, but not all do this. MOHSS needs this information to accurately reflect activities and for planning purposes. Physicians can bill under FFS for work done "over and above their regular workday".

Administration of the APPs is carried out by the Ministry.

Prince Edward Island

PEI is really moving quickly in the direction of establishing AFPs. Close to 20% of physicians in PEI are on AFPs. A new agreement has just been negotiated with the Medical Society, which will run from April 2004 to 2007. There are three types of AFPs in PEI:

Salaried model;
Sessional (contract for services, paid by hour); and,
House physicians (in long-term care facilities who receive a stipend for services).

The following departments have AFPs: ENT, psychiatry, pediatrics (this group has been on salary for some time), OB/GYN, pathology, anaesthetics, internal medicine, geriatric, medical oncology, radiology oncology, addiction services, ophthalmology, palliative care, and physical medicine. All of these AFPs come under one Master Agreement. Physicians can be community based or institution based. There are no teaching hospitals in PEI, and AFPs cover only clinical services

Shadow billings are mandatory, and are part of the contract. They are the main source of information on AFP productivity and deliverables. Compliance is "fair", but getting better. PEI has been looking at the Québec model of tying payment to compliance. There are no other information systems against which shadow billings are cross checked.

There have been some concerns about productivity, mostly with respect to GPs, less so with specialists. There is currently an evaluation of health centers (for family medicine) to examine productivity. A working group has been formed to look at productivity, in conjunction with medical directors.

There are five RHAs in PEI, and the RHAs pay physicians, and are subsequently reimbursed by the DHSS. The RHAs are now signatories to the AFP agreements and are responsible for the

contract and for ensuring performance (they don't negotiate the contract, but that may change in the future). The Provincial Health Services Authority looks after all specialist services.

Analysis and Conclusion

The inter-provincial/territorial comparison has brought to light certain commonalities among AFP and in the management of AFPs across the country. (see Table 5 below)

Table 5 Overview of AFAs in Canadian Provinces and Territories

Jurisdiction	Alternative Funding Arrangements	Percent of total physicians paid through alternative modes [CIHI 2004]	Administration of AFA	Reporting Systems	Compliance
Alberta	Alternative Payment Plans (APPs) and Academic Alternative Relationship Plans (AARP)	4.4%.	Regional Health Authorities	Shadow billings, but plans are to replace this with an accountability framework workload management system	Limited compliance
British Columbia	Alternative Payment Program	28.4%	Regional Health Authorities		
Manitoba	Over 60 different AFP contracts	34% of physicians receive some type of additional funding	Regional Health Authorities	Limited shadow billing /RHAs monitor productivity	Limited compliance
New Brunswick	Uses term "salary"	39.2%	Regional Health Authorities	Shadow billing	Limited compliance
Newfoundland	Alternative Payment Plans	38.8%	Regional Health Authorities	None	
Northwest Territories	Information not available				
Nova Scotia	Alternative Payment Plans & Alternative Funding Plans	64.3%	Department of Health	Shadow billing	Limited compliance
Nunavut	Per diems		Department of Health		

Jurisdiction	Alternative Funding Arrangements	Percent of total physicians paid through alternative modes [CIHI 2004]	Administration of AFA	Reporting Systems	Compliance
Ontario	Alternative Payment Plans & Alternative Funding Plans	13.7%	Ministry of Health and Long Term Care	Some shadow billing (SEAMO uses counter data billing)	
Prince Edward Island	Alternative Funding Plans	30%	Regional Health Authorities	Shadow billing	Limited compliance
Québec	Alternative Funding Plans "blended funding"	53.5% of all physicians $ 50% of all surgical & medical specialists	MSSS and RAMQ	Shadow billing, productivity monitoring systems	Full compliance, payment dependent upon
Saskatchewan	Alternative Payment Plans & Alternative Funding Plans	16%	District Health Authorities	Some shadow billing – DOH tracks productivity	Limited compliance
Yukon	Alternative Funding Plans	4.7%	DOH	Some shadow billing	Limited compliance

Most jurisdictions have chosen to implement some type of alternative payment system, noting the drawbacks of FFS systems in addressing certain health care objectives. APPs are seen to provide solutions in improving access to health care, for example in rural areas with small or widespread populations, where it is difficult to recruit and retain physicians, or to compensate physicians for labour-intensive services. Alternative payments are also seen to be a positive payment model in academic health science centers, where specialists are required to undertake a variety of functions, including clinical services, clinical teaching, research and clinical administrative duties.

AFPs are considered to have the potential of providing for a more holistic and integrated set of services, and as such, to contribute to quality of care. The number of AFPs is growing across the country, as a percentage of total payments to physicians.

In most jurisdictions surveyed, AFPs are being administered or managed by regional agencies, as these are considered to be more knowledgeable about, and directly concerned with, the delivery of medical services to respond to demand.

However, at the same time, most jurisdictions contacted with grappling were the issues of redefining performance management systems under AFP, including accountability, deliverables, reporting, monitoring, and indicators. Shadow billing was still being utilized in many jurisdictions; and while not considered the optimal system, no suitable replacement had been identified or instituted as yet. National efforts to develop performance measurement frameworks for AFPs would be considered beneficial, and affect economies of scale, so that each province/territory would not need to design its own system independently. Furthermore, since there is a need for national collection of health information, utilization data, provider related data, as well as medical services costs, standardization of this type of information would be needed for comparative purposes.

4.2.3 Effectiveness Analyses

This part of the VFM audit attempts to answer the question: ***Are the outputs getting the results that we want? Or, are we doing the right things?***

The first part of the value for money effectiveness analyses examines the role of alternative funding systems within the broader Nova Scotia Department of Health goals and objectives, followed by an analysis of the effectiveness of the DOM AFP based on the results of surveys/questionnaires sent to stakeholder groups in the AFP.

4.2.3.1 AFPs and Department of Health Policy

This section of the Report will analyse the role of Alternative Funding systems within the broader Nova Scotia Department of Health goals and objectives, to determine whether AFPs are aligned with provincial policy directions. AFPs will also be examined within the context of the Capital District Health Authority mandate.

Documents reviewed for this analysis include:

Department of Health Business Plan 2001-2002
Department of Health Business Plan 2002-2003
Department of Health Business Plan 2003-2004
Capital District Health Authority Mission Statement and Strategic Directions (2003-04)
Good Medicine: Securing Doctors' Services for Nova Scotians, 1997
Reports of the Auditor General of Nova Scotia, 2000 and 2003.
Department of Health, Annual Accountability Report for the Year 2002-03

The statement of vision and mission in the Department of Health policy documents reviewed refer to the provision of a health care system which is" integrated" and "sustainable", and make specific reference to a system which offers "appropriate access to specialty services (secondary

and tertiary) provided in a way which builds and sustains a modern health care system and meets the needs of Nova Scotians" [***Business Plan 2001-02***]. The statements further refer to a health care system which is balanced in terms of the types of services offered to the residents of the province, and places priority on community-based service.

Corporate Values highlighted in the 2003-04 Business Plan include Collaboration, Innovation and Accountability.

The Goals and Strategic Directions specify the development and "implementation of a health human resource strategy which addresses recruitment, retention and renewal issues" [2001-02, 2002-03]. It is further stated that efforts will be made to implement the DOH goals in a collaborative manner among the district and community boards and Provincial health care centers. The 2003-04 Business Plan lists Quality, Access, Wellness, Accountability and Sustainability as the five identified Strategic Goals for the province.

Core Businesses of DOH will involve: "…community-based services, which will be the foundation of the integrated system…an appropriate range of treatments and procedures in a variety of settings to meet the needs of a growing and aging population".

Priorities for 2002-03 include, under the heading of a health human resource strategy, a "comprehensive study of alternative physician payments models, examining the strengths and weaknesses of each in terms of recruitment, retention, payment basis, scheduling, and other relevant factors".

Finally, Guiding Principles for Ethical Decision-Making (2003-04) include:

- Balance the greatest good for the greatest number with targeting high risk/disadvantaged population;
- Equitable opportunities to achieve positive health status (outcomes) regardless of place of residence;
- Evidence and research-based decision making; and,
- Sustainable – plan for today's and tomorrow's needs.

From the statements above, it is clear that alternative funding plans, and specifically, the DOM AFP, are consistent with the DOH mission, in providing for the delivery of specialist services in key medical areas. Through the support of the delivery of clinical services, clinical teaching, and research, the AFP contributes to the sustainability of the Nova Scotia health care system, in ensuring that the complement of specialist physicians in the 16 divisions of the Department of Medicine continues into the future The AFP can also be considered to have supported the tendency to offer more integrated care, in terms of emphasizing greater collaboration among the divisions within the Department of Medicine, and also by fostering more team work in the delivery of care, teams involving physicians, nurses, clinical nurse specialists or nurse

practitioners, other clinical assistants, hospitalists, and technologists, in a way which the traditional FFS system did not support.

AFPs have also supported community-based delivery and outreach programs (such as the Airway Management Clinic in Musquodoboit, and the numerous telehealth and teleconsult activities undertaken across the province) of specialist services, enabling the provision of these services in other regions of the province.

The DOH Business Plans make frequent reference to "balance" of health care services and places emphasis on community-based delivery. In future plans, it would be useful to quantify how DOH resources are to address this challenge, i.e. the objectives regarding how the MSI envelope is to be allocated among the various levels of care, from primary to quaternary. This setting of policy objectives, together with quantitative targets to be reached, would assist DOH managers in better matching health care resources with population health needs, current and projected. This would also assist in more effective monitoring of compliance with provincial objectives. For example, both Business Plans emphasize the importance of Primary Health Care and state that it is a priority for the NS DOH, while health care resources allocated to PHC do not necessarily reflect this shift or emphasis in priority.

Medical payments actuals for fiscal year 2003/04 totaled: $448,583,760, with the following breakdown:

FFS	260,969,139.
AFP	123,429,906

Compared with fiscal year 2000/01, where the breakdown was:

FFS	$220,403,160
AFP	$85,274,755.

This reflects a 44.7% total percentage growth of AFPs over this period, and underlines their growing importance in the MSI funding envelope.

Reference is made in the DOH ***Annual Accountability Report for the Year 2002-03***, to conducting a comprehensive study of alternative physician payment model, examining the strengths and weaknesses, as well as analyzing diverse payment mechanisms. This study should be encouraged so as to provide DOH with more meaningful information upon which to base decisions on AFPs.

The provincial health human resource strategy upon which physician complements can be planned (and contracts negotiated) is still under development. This strategy is a key element in the provincial management of health care dollars, and in the enhanced management of all

components of the health care system to ensure "balance" and "sustainability". The ***2003-04 Business Plan*** refers to the importance of "integrated, multi-disciplinary and cross-functional approaches" to health service delivery. With the increase in alternative funding systems used in the province, and with the shifts in practice patterns promoted by this funding structure, which encourage more integrated, team-based approaches, DOH might consider promoting a more integrated and comprehensive health human resource strategy for Nova Scotia, rather than a physician resource plan, and one which is based on planning for health services rather than planning for health care providers. Several decades of health reform, together with the reconfiguration of the health care landscape, requires moving HHR planning and management from a provider-specific approach, to one that is more closely linked to population health planning and needs. This might entail moving from planning for specific health professionals, to planning for services, with delivery provided by the best mix of providers.

The Business Plan also underlines the importance of ensuring that "health services planning and delivery, funding formulas, accountability frameworks, and business planning at the provincial and district levels, will be evidence-based and realigned with the changes to the health care system" [2001-02]. "Best practice will be achieved through the use of clinical guidelines and clinical pathways, standards and performance indicators" [2001-02]. The 2003-04 Business Plans highlights the importance of accountability and health systems performance measurement.

From the audit team's analysis, it has clearly emerged that the DOM AFP has contributed to more emphasis being placed on clinical guidelines, best practice and evidence-based medicine, as well as to a system which more effectively rationalizes the delivery of specialist services based on need and level of urgency. [ref**. *Department of Medicine Annual Reports***]

In order to achieve the accountability objectives and targets, it will be essential for DOH to strengthen its capacity to manage AFP programs and information systems, which will provide it with essential data on performance, on best practices, on cost management and on quality of care. Management systems must include accountability frameworks for all programs, including AFPs, which clearly delineate programs goals and objectives, required inputs, outputs, outcomes and long term results to be obtained. The framework must also provide performance indicators, to enable systematic and regular performance monitoring, and the capacity to make required on course adjustments when variances are reported. [Appendix B provides a model accountability framework which could be used in designing and managing AFPs]

Both Business Plans refer to the need for reconceptualised information technology and systems to manage health programs. The increase use of AFPs to fund specialist medical services would dictate the need for a redesign of management information systems which can provide for improved and integrated data on service provision and utilization, productivity and, in the longer term, quality of services and health outcomes. Close to 30% of MSI funds are now spent on AFPs and this shift requires information systems which can oversee the performance of AFPs, as well as the financial administration of these health care resources. The ***2003-04 Business Plan***

cites the Wait List Strategy as a Strategic Priority, so as to establish "reliable and comparable information on wait lists and wait times….for good health care planning, service delivery and public accountability". With the federal government's emphasis on a national wait list strategy, there is an opportunity for national standards and performance targets to be defined and established, which will enable more accurate assessment of the health system's efficiency.

It is also important to note that, in the 2000 Report, the Auditor General underlined the need for clearly established objectives and specific outcomes expected in all AFPs signed by the DOH. The lack of a provincial physician resource plan, upon which to base this analysis and determine the required number of FTEs within each specialty, was seen as a system weakness. These issues were again highlighted in the 2003 Report.

At the Capital District level, the documents reviewed highlighted the following policy directions:

CDHA Mission and Strategic Directions

1. Improve Care for Patients, Clients and Community

   This strategic direction refers to providing care that is patient centered; to improving access; managing wait lists; adopting best practices, using resources wisely, integrating services; adopting best practices; striving to improving health outcomes; and,

2. Build Knowledge

   This strategic direction refers to fostering interdisciplinary care teams; sharing knowledge; promoting research and education; promoting evidence-based practice, inquiry, evaluation and learning.

Discussion

From the CDHA Mission and Strategic Directions, it is clear that the DOM AFP is consistent with the principles and directions enunciated in these documents. It was intended that the AFP would support the three-pronged objectives of clinical service, teaching and research; that it would provide enhanced patient care; improve access to specialist services; adopt best practices and improve health outcomes for the populations served. Likewise, the AFP mechanism was seen to promote integrated care and a team-based approach to service delivery through the use of multidisciplinary teams working across specialty areas, in a way that the FFS model did not foster. As such, AFPs can be considered to be consistent with CDHA corporate goals and objectives.

In light of the above analysis, the following recommendations are proposed.

Recommendations

In view of the benefits to the Nova Scotia health care system provided through the DOM AFP, that DOH should continue to provide funding of the DOM through an Alternative Funding Plan.

Rationale: The audit study and survey results have demonstrated the many benefits which the DOM AFP has provided, including: enhanced specialist recruitment and retention; a strengthened academic program; more appropriate and high quality patient care; integrated team-based provision of services; more collaborative and community-based delivery; which could not have been possible under a FFS system. The high quality of care provided by DOM was also emphasized by the survey response. In light of this supporting evidence, it is recommended that AFPs continue to be implemented with academic based specialist departments, with the proviso that appropriate control and management mechanisms be put into place to manage AFPs.

DOH should develop a stronger statement of its AFP policy and its policy objectives for AFPs, linked to the DOH Strategic Direction and Business Plans.

Rationale: AFPs need clearer and a more coherent policy direction in the provincial health strategy and could benefit from a stronger strategic direction.

DOH should develop an overarching policy for Alternative Funding Initiatives, and make a clear differentiation between Alternative Funding Initiatives and Alternative Funding Plans; and to further distinguish Academic AFPs from regular AFPs. Standardization of funding models should be considered.

Rationale: The various AFI/AFP models should be clarified and their different policy directions and objectives understood. For example, academic funding plans, physicians alternative funding (e.g. pediatricians in Annapolis Valley); alternative funding initiatives (nurse practitioner/physician teams); emergency room funding; and other categories (rural stabilization funding) all have different policy objectives and funding models. These models are not standardized across the province and would benefit from better defined policies, goals and objectives, as well as evaluation mechanisms. The AFP was intended to promote a better alignment of the performance of the clinical departments with the goals of CDHA.

DOH should consider implementing an Omnibus AFP for the entire Dalhousie Faculty of Medicine, containing separate funding provisions for various specialties, but ensuring common administrative support, relevant academic support, common managerial provisions, and deliverables applicable to each specialty area.

Rationale: to enable more administrative and cost effective management of AFPs, including standardization of policies, operations, reporting systems, and financial administration. An omnibus AFP would furthermore support more effective integration and management of clinical services at CDHA and IWK.

Funding streams for the educational components of the AFP should be revisited and jointly reviewed by DOH and the Department of Education to clarify funding responsibilities. DOE funding commitments should be clearly identified in the relative funding allocations for clinical and academic activities.

Rationale: Although the **Principles** document (2002) is of no force and effect after March 31, 2004, there was, as with the first AFP, a lack of compliance with respect to the funding responsibilities established in this document. Currently, the DOH is funding, through the AFP, clinical services, teaching, research and administration. The Physicians Services funding is thus subsidizing educational activities at Dalhousie DOM. There is a common understanding between DOH and DOM that the AFP funding was to include clinical and non-clinical activities. Verbal reports vary from 80:20 to 60:40 (clinical/non-clinical ratio). While clinical teaching may be considered a component of an academic AFP, academic (i.e. classroom) teaching and research activities ought to be reexamined and funding responsibility established. A decision needs to be made with respect to which DOM activities are funded by DOH. Deliverables for educational and research activities should be clearly articulated by the governmental department which has responsibility for that mandate.

4.2.3.2 DOM AFP QUESTIONNAIRE/SURVEY

The following sections provide an analysis of the effectiveness of the AFP based on the results of surveys/questionnaires sent to eleven stakeholder groups of the AFP.

Approach and Methodology

The survey activities involved the design and development of research parameters, audiences, questions and reach. These were organized around research objectives namely:

- Examination of how the DOM AFP reflects and supports the DOH and CDHA goals and objectives;
- Examination and comparison of envelope/range of services provided (pre/post AFP) (e.g. clinical services, teaching, research, administration, plus supplemental patient services such as telephone consultations, community outreach programs, e-mail consultations, telehealth, teamwork, quality control, etc.);

- Examination and comparison of clinical services delivery (pre/post AFP);
- Examination and comparison in changes to access to services/reduction of waiting lists/wait times; and,
- Examination and analysis of quality of services provided.

The information source(s) and instrument(s) were identified for each objective along with the research questions and were presented to the DOH for review, discussion and approval.

Questionnaire Survey

Survey questions were developed and organized by audience, with a questionnaire developed specifically for each audience/respondent group. The eleven respondent groups comprised AFP stakeholders, and included:

- All full-time and community-based physicians in the Dalhouise DOM;
- Dalhousie DOM Medical Residents;
- Dalhousie Faculty of Medicine senior officials;
- Department of Health senior officials;
- CDHA senior officials;
- CDHA Nurse Managers;
- District Health Authorities senior officials;
- Senior Officials of Doctors Nova Scotia (MSNS) (including Section of General Practice) and CDHA Family Practice;
- Referring physicians (to DOM specialists);
- Specialists outside the AFP; and,
- Patients referred to DOM physicians.

The DOM respondent group was further divided into the sixteen divisions of that Department.

The 'referring physicians' audience was defined as general practitioners (GPs) who have referred patients to specialist(s) in the Department of Medicine, both before and after the Alternative Funding Plan was implemented. GP's who had referred patient(s) to specialists within the DOM in the 1997/98 time period as well as the post 2000 time period were identified so as to draw a pre and post-AFP comparison. (It should be noted that referrals to specialists in Palliative Medicine and in Geriatrics were not included, due to the fact that these specialty areas were not a part of the initial AFP signed in 1999.) The number of patients a GP referred to specialists within the remaining 14 identified Divisions varied significantly. In order to ensure that the survey covered GP's referring to all specialties, whether just a few patients or numerous patients, the following criteria were used to select the GP audience surveyed. The GP's were divided into six groups per Division as follows: if the number of patients the GP referred to a specialist within that Division between 1997/98 and 2004 was between 1-10 the GP was considered a Level 1 referral; Level 2 is between 11and 30 patients; Level 3 between 31 and 50 patients; Level 4

between 51 and 100 patients; Level 5 between 101 and 500 patients; and Level 6 between 501 and 1000 patients. The GP's were then further divided into three groupings - low, medium and high referral rate - for each of the Divisions. Low, medium and high referral rates were defined as follows:

- Divisions with referrals of up to 100 patients from a GP in the time period identified (or up to Level 4) - a low referral rate was considered a Level 1 and 2, medium was a Level 3 and high was a Level 4. (There were four Divisions that fell within this category);
- Divisions with referrals of between 100 and 500 patients in the time period identified (Level 5) - a low was considered a Level 1, medium a Level 3 and high a Level 5. (There were nine Divisions that fell within this category); and,
- Divisions with referrals of over 500 patients in the time period identified (Level 6) - a low was considered Levels 1 and 2, medium Levels 3 and 4 and high Levels 5 and 6. (There was one Division that fell within this category).

The sample size of 70 referring GP's (10% of the total number of GPs who have referred patients to specialists in the DOM within the established time frame) was then randomly chosen from within the low, medium and high groupings per specialty as follows: one GP per specialty with a low referral rate, for a total of 14 GPs, two GPs per specialty with a medium referral rate, for a total of 18 PGs and one GP per specialty with a high referral rate, for a total of 14 GP's. The remaining four were randomly selected from the medium referral rate groupings.

The patient audience was defined as those patients who have been referred to a specialist within the DOM both before and after the AFP was implemented. Each patient identified was exclusive of one referring GP, and if s/he was were seeing more that one specialist, the specialty seen most often and most recently was the specialty identified. The specialist was identified in the cover letter to the patient. The total number of patients identified who met these criteria was 9856. The total number of services from 1999 to 2004 was ordered from the highest to the lowest, and every tenth service was chosen yielding 10%, or 985, patients to survey.

Survey questions for all eleven sets of questionnaires were pre-tested to ensure that the questions were clear to respondents and posed no ambiguity. One respondent from each group was chosen and sent the questionnaire for review and comments. Suggested changes and recommendations were discussed with a project team member and a finalized questionnaire agreed upon. The following Table (Table 6) details the audience or respondent groups surveyed.

Table 6 Key Respondent Groups Surveyed

Audience	Number sent the questionnaire	Questionnaires returned
Dalhousie DOM Specialists	171	142
Dalhousie University Faculty of Medicine Senior Officials	3	1
Dalhousie DOM Medical Residents	65	27
Department of Health Senior Officials	5	5
CDHA Senior Officials	3	1
CDHA Nurse Managers	25	19
District Health Authority Senior Officials	18	12
Senior Officials Doctors NS and CDHA Family Practice	4	4
Referring Physicians	70	45
Specialists outside the AFP	60	35
Patients	985	585
Total	**1409**	876

All participants were sent a preliminary letter informing them about the survey and their participation requested. Confidentiality was assured. The questionnaires were then mailed to the individuals along with an introductory letter and a self addressed stamped envelope.

The letter and questionnaire for the patient audience were sent from, and returned to, Atlantic Blue Cross Corporation for confidentiality reasons and to ensure a better response rate.

Returning questionnaires were tracked, and a follow-up phone call (or in some cases an e-mail, for residents) was made to individuals (with the exception of the patient group) if the questionnaire had not been returned within a week to ten days.

The responses from each questionnaire were then entered into an audience-specific data base. The responses were not keyed to individual respondents. The responses were analysed and summarized.

Overview of Survey Results

The following sections summarise the findings by audience. Detailed summaries of responses by audience, including divisional responses within the DOM, can be found in Appendix C.

Specialists in the Department of Medicine

From the survey information, it is clear that members of the DOM AFP view the AFP in positive terms, citing the benefits of working under this type of system. The AFP appears to have met its mandate of enabling specialists in the DOM to undertake a balance of clinical and academic activities, although most reported having been able to undertake these activities pre-AFP. In

terms of impact, most believe that the AFP model had contributed to enhanced service delivery and better care for patients, as well as increased volume of services.

Most respondents in the DOM report that there have been benefits working under an AFP. Areas which have particularly benefited primarily include clinical services (44% of the respondents), teaching (37%), administration (33%) and research (31%), in that order. To a lesser extent, telephone consultation (15%), community outreach services (7%) and telehealth (6%) activities were also reported to have benefited under the AFP.

The majority of the respondents felt that the AFP has had a beneficial impact on the delivery of clinical services in their Division and noted an increase in these services (40% a "moderate increase" and 21% a "significant increase").

As reported in this survey, all members of the Department of Medicine undertake clinical services and teach, while approximately 80% also engage in research and administrative functions. Almost half of the respondents noted that they were able to undertake all of the activities they identified before the AFP.

In terms of the AFP affecting methods of practice, respondents from the DOM cited a greater use of expanded practice nurses and physician extenders, seeing more acute patients, engaging in more health promotion and disease prevention, spending more time in clinical teaching and spending more time with patients.

The utilization of in-patient facilities, out-patient care or use of diagnostic testing were not thought to have been affected by the AFP for 49% of respondents.

Most respondents felt that their working relationship with primary care providers had not changed during the AFP. But almost 20% have noted a change. The overwhelming majority of respondents (93%) believe that the triage system in place is effective, with 88% claiming that wait time/wait list information has been utilized to manage patient access to care.

Patient access to care was thought to have improved by almost half of the respondents. The quality of clinical services was described as "very good" to "excellent" by a large majority of respondents.

Dalhousie University Faculty of Medicine Senior Officials

Only one respondent returned the completed questionnaire. The impact of the AFP on the DOM was described as "excellent", and was seen to have "moderately improved" clinical services provided by DOM physicians. Likewise, teaching activities were considered to have "moderately improved", while research had "significantly improved". The respondent also reported that administrative activities under the AFP had "moderately improved". New models of clinical care

had evolved as a result of the DOM AFP, and the AFP was considered to have contributed to a balance of activities, without the pressure of having to generate clinical earnings.

Strengths of the AFP included more appropriate clinical care; more teaching; more and better quality research; more effective administration; more accountability for activities and services provided. Disadvantages of AFPs included the external perception that DOM members have "slacked off" under the AFP, which have resulted in "some strained relations".

The DOM AFP was seen to have contributed to a more integrated approach among clinical service providers, with more interaction and collaboration among the divisions of the DOM.

"The AFP has been the tool that has kept the DOM as a united entity. Without it, there would be no Department of Medicine as it exists today, and no Department of Medicine would have serious negative implications for the CDHA, Dalhousie University Medical School, and health care in general in Nova Scotia."

Dalhousie DOM Medical Residents

Assessment provided by the group of respondents was generally positive with respect to the quality of teaching in the DOM; however, few respondents could point to the AFP as the reason for the high quality of education being received in the DOM. Some comments provided by residents point to a certain loss in efficiency in patient services, which they believe is perhaps compensated by a higher, more holistic quality of care.

The majority assessed the quality of teaching provided by DOM affiliated physicians as "good" to "very good". Almost three quarters of the respondents felt that the quantity of time allocated to teaching was adequate. Of those who were able to offer a pre and post-AFP comparison, most found no difference in the quality of their academic experience under the AFP. The majority of residents stated that they believed that patient access to specialists was "very good", and the number of patients seen in the DOM was rated positively. Generally, the quality of clinical services was rated very highly by the resident respondent group.

Issues raised by respondents center around the lack of patient follow up. One respondent noted that "wait times seem worse now, but it is certainly not because staff are doing more teaching". While one respondent noted that "quality of patient care is superior under (the) AFP, as is the time devoted to each assessment, thus ensuring more holistic patient care"; others stated that "AFP tends to have doctors seeing fewer patients than they should", and that "AFP does make clinical care less efficient i.e. fewer patients seen in the same time period".

It was also highlighted by one respondent that the AFP offered increased opportunities for DOM specialists to teach and to improve patient care. "The bottom line becomes delivery of quality medical care, instead of income. This is in keeping with the Canada Health Act".

Department of Health Senior Officials

Most respondents from DOH believe that the AFP reflects and supports DOH goals and objectives for the management of specialist physician services. 80% of respondents believe that the DOM assists the DOH in meeting the provincial goal of improving access to tertiary services.

The impact of the AFP on the provision of clinical services was described as "moderately improved" by 80% of respondents from DOH. However, access to specialists was thought to have "moderately deteriorated" by more than half of the respondents. In terms of volume of services, 40% noted a "moderate decrease", with 20% noting "no change" 20% noted a "moderate increase" in volume of services. All respondents believed that the AFP had led to improvements in the quality of care.

Most respondents from the DOH believe that the triage system is being utilized to effectively manage access to specialist services in the DOM.

CDHA Senior Officials

Only one respondent returned the completed questionnaire. The respondent believed that the AFP significantly reflected and supported CDHA's goals and objectives, and assisted CDHA in the management of specialist services for the province and the region. The AFP was seen to contribute to a more appropriate model of care, particularly in the areas of general internal medicine, cardiology, gastroenterology, diabetes care, chronic renal care, and district palliative care services. Access to clinical services was described as being "moderately enhanced" under the AFP, as was volume of patients; whereas quality of care was described as having "significantly improved".

Current access to specialist DOM services was described as "very good" and quality of care as "excellent". The respondent believed that the triage system was not being utilized effectively to manage patient access to DOM services, and that DOM needed to better educate primary are providers regarding its use.

CDHA Nurse Managers

Respondents from the nurse managers group were evenly divided about the impact of the AFP on the DOM, with 50% noting positive changes, and 50% observing negative changes. No changes were observed in the quality of care provided to DOM patients.

The majority of nurse managers are familiar with the DOM triage system (one quarter were not familiar with it), and believe that it is utilized effectively to manage patient access to DOM services. However, it was noted that wait times were increasing and waiting list growing longer.

Most respondents did not notice any changes in the role of nurses and/or allied health professionals under the AFP, but those who did noted the expanded role of nurses and a greater emphasis on collaborative care: "the team uses data and together works to improve access and services".

District Health Authority Senior Officials

The majority of DHA senior officials across the province stated that the quality of care had not changed in the DOM under the AFP. However, approximately 70% of respondents believe that there has been a moderate deterioration of clinical service delivery to patients in their district referred to DOM specialists since the AFP was introduced. Nearly half felt that patient access to DOM physicians had deteriorated since the AFP.

Most respondents were not familiar with the DOM triage system; of those who were familiar with it, these did not believe that it was being managed effectively to administer patient access to DOM services.

In general, DHA officials noted that the AFP did not assist their districts in meeting their clinical care objectives, and that DOM was not providing them with the response they required.

Issues raised by DHA officials included longer wait times and loss of ability to refer to specialists of their choice. Positive comments included improved retention and greater participation by DOM physicians in district planning and leadership activities.

Senior Officials of Doctors Nova Scotia (including Section of General Practice) and CDHA Family Practice

Respondents from this group stated that access to and referral response times of DOM specialists had "significantly" or "moderately" deteriorated under the AFP. Likewise, all respondents noted a decrease in volume of patients seen by DOM physicians. Most respondents also reported a deterioration in the quality of care provided by the DOM.

Most did not believe the DOM triage system was working effectively.

50% of respondents of these groups noted a negative change in the professional relationships between GPs and DOM specialists, while the other half did not notice any changes.

Changes reported include the observation that DOM specialists are spending more time with their patients, as well as spending more time in clinical teaching, research and administration.

Referring Physicians

In general, comments from referring physicians indicate a potential breakdown between the primary and specialist systems, and the need for better relationships and communications under an alternative payment plan.

The majority of GPs surveyed stated that access to specialists in the DOM had been reduced since the introduction of the AFP, with most describing access as "fair" to "poor". However, major differences were noted in the various divisions of the DOM, and comments were not intended to be blanket statements about the Department of Medicine as a whole. It is clear that referring physicians had views on which divisions offered them better service for their patients (see Appendix C-9 for detailed analysis).

40% of referring physicians were not familiar with the DOM triage system, and of those who were familiar with it, 55% believed that their patients were not being triaged effectively.

Concerns identified by referring physicians include: lack of, or difficult, communications with DOM specialists; lack of patient follow up, lack of a coordinated approach, inconsistency in quality of care; long wait times; "downloading of work to Family doctors"; non-clinical priorities having precedence over clinical ones.

Quality of care, however, was not seen to have changed by the majority of respondents, as a result of the AFP, although close to one quarter noted a deterioration in the quality of care.

Specialists outside the AFP

Responses from specialists outside the AFP underscore the fact that the objectives of the DOM have not been effectively communicated to other DOM stakeholders, who do not have a clear understanding of the role and scope of AFP specialists. This needs to be better addressed in future AFPs, so as to provide for better integration of specialist services.

The majority of specialists outside the AFP stated that the AFP has had, overall, a negative impact on the delivery of clinical services in their specialty area. The drawbacks specifically listed included: longer wait times, reduction in quality of the consultation, as well as the delegation of assessment and reporting to nurse practitioners and residents. Also cited were less availability of DOM physicians, less enthusiasm to see patients, and a general tendency to see

fewer patients. Lack of accountability and disincentives to work hard were cited by some respondents as direct effects of the AFP.

It was also observed by one respondent that the AFP had led to a decrease in the capacity of other regions to compete with the CDHA in the recruitment of specialists.

Two thirds of respondents believed that the AFP had led to a different mode of service delivery at the DOM, citing telephone; mail-consultations; a focus on more acute patients; more disease prevention and health promotion activities; providing second opinions through video or teleconferencing. Care was seen by some respondents to be more integrated, as specialists were less interested in "taking control of a case". It was felt by some respondents that research and administrative functions were being undertaken to the detriment of patient care, and that the AFP contributed to a model of care which was more impersonal, and led to some disorganization. Most agreed that the AFP had promoted the combination of clinical services, teaching and research activities. Some noted that the AFP had widened the gap between the primary and specialist systems.

Volume of services by AFP consultants was seen as being "inconsistent" by the majority of respondents, with one third noting that it had decreased under the AFP. Cardiology was one division noted by several respondents as having visibly increased its volume of services. Most respondents did not observe any changes in the utilization of in-patient facilities, out-patient care or use of diagnostic testing. However, greater use of advance practice nurses was noted.

Quality of care offered by AFP specialists was rated well by most respondents, although this rating was qualified by citing Divisions within the DOM. One respondent stated: "once patients are seen…the quality of care is very good. Waiting time to see a specialist is too long".

Most respondents in this specialist group were not familiar with the DOM triage system. Several respondents reported that their practices had grown as a result of the AFP, and that more GPs are referring to them, as a result of "frustration with the QEII".

Patients

The majority of respondents describe the quality of care received from their specialist as "excellent" or "very good". Three quarters of respondents have not observed any change in quality of care since after the implementation of the DOM AFP (2000). Of those who did notice a change, respondents alluded to increase time spent with them, and on improvements in the quality of services. Some patients underlined a longer wait time, and that "the specialist was too rushed", although the majority of respondents did not report seeing any change in wait times. Likewise, most respondents did not believe there to be any changes to the amount of time that

their specialist spent with them during a consultation, and the range of services provided by the specialist included nutrition counseling, lifestyle changes, and advice on pharmaceuticals.

The majority of comments offered were very positive about DOM physicians, and included "high quality care" and "compassion". In terms of negative comments, 15% of respondents reported lack of availability of their specialist, who was doing "too many things outside of patient care"; having to see the "doctor whose turn it is to man the clinic", and "not receiving any follow up".

Conclusion

The survey results have brought to light important divergences of view especially between the DOM specialists on one hand, and referring GPs and specialists outside the AFP on the other, perhaps underlining the need for an improved communication strategy outlining the objectives and expected outcomes of the AFP system. There is clearly a need to define and explain the role and function of the academic physician to those outside of the Faculty of Medicine and better define responsibilities of primary and secondary caregivers. Of particular concern to DOH managers is the question of potential fragmentation of care between primary care and specialist levels, particularly in light of the DOH goals of "integration" and continuity of services.

Recommendation

DOH Physician Services Group resources should be increased to manage AFPs more effectively. This should include contract management, productivity and compliance monitoring of clinical outcomes, performance management, stakeholder satisfaction, financial administration, etc. The management of AFP at DOH should be done with the collaboration of Physician Services, Finance, Policy, and Information Systems. A minimum of two specialist managerial positions should be included in the increased complement accompanied by adequate clerical/system support.

Rationale: It is estimated that by fiscal year 2004/ 2005, AFPs will represent approximately $178M in alternate funding initiatives, out of a total physicians services budget of $500 M, constituting close to 40% of this budget. The move away from FFS to AFPs has created a gap in the monitoring mechanisms which have been in place under ABCC. AFP performance is not currently being monitored to the same extent or in the same fashion as FFS data. The introduction of AFPs as a funding mechanism for physician services requires a new performance management model which brings into play contract design and development, output monitoring, compliance with contract deliverables, clinical outcomes monitoring, stakeholder satisfaction, reporting and course adjustments. As such, AFPs require a new management system, which needs to be supported by appropriate management resources at DOH. Physician Services staffing pre 2002 was considerably larger than the current complement. In view of the fact that the

Physician Services budget has increased annually, that more AFPs have been introduced, and that the complexity of managing AFPs is greater than FFS administration, there is a requirement for a substantial increase in human resources to manage physician services. In addition, there is a requirement for integration of existing management information systems, as well as the introduction of new information systems to better support AFPs.

4.3 AFP EVALUATION

The final component of the Audit process was an evaluation of the AFP in terms of contract management and operations. Process evaluation is a key management tool which provides information as to whether a program or activity is consistent with its design specifications, and examines what resources have been expended in the conduct of the program, in this case, the DOM AFA. Most importantly, the evaluation can determine how well the program has worked in reality. – i.e. how the AFP has worked in practice over the course of the contract period. Process evaluation enables reviewers to compare and test for congruence between intended activities and actual implementation, between contractual requirements and contract compliance. In contradistinction to auditing, which compares "what is" with "what ought to have been", process evaluation centers on what has, in fact, occurred, during the tenure of the contract. As such, it provides valuable information to program managers and stakeholders as to whether the program is meeting its specifications. In many cases, implementation problems can be linked to design issues, and these will have an impact on outcomes achieved by the program. Information from the evaluation can assist managers in future program design options, and in this sense, process evaluations are an important management tool.

Process evaluation is also valuable for monitoring programs from an accountability perspective. Information obtained from process evaluations may enable mid-course adjustments or changes to future programming design. Findings from process evaluation provide critical insights to explain impact findings, and to enable managers to make important decisions on the program, which can include incorporating corrective measures, deciding whether a program should be continued, expanded, reduced, or discontinued.

4.3.1 Approach and Methodology

Process evaluation is particularly valuable for innovative programs, such as AFPs, especially in light of potential unexpected results or side effects which often surface during implementation, or as a result of unforeseen circumstances or a changing external environment. As relatively new funding mechanisms, AFPs require close monitoring and evaluation to assess how well they are working in achieving their objectives. Information provided by the AFP evaluation may thus

enable program managers at the DOH to consider alternative measures, adopt corrective action, or to redesign the AFP in light of this feedback.

In general terms, the evaluation has attempted to answer the following questions: ***Is the Department of Medicine AFP meeting its goals and objectives? Is it an effective tool to manage specialist physicians' services? Is the AFP working as expected?***

The evaluation of the DOM AFP specifically focused and analysed the following major areas.

1. Conformity of AFP with DOH/CDHA Goals and Objectives:

Questions under this heading examined:

- What were the intended results of the DOM AFP?
- Is the AFP meeting its goals and objectives?
- Do these conform with the DOH and CDHA general goals and objectives for the management of specialist physicians' services?

2. Examination of AFP development process:

Under this heading the audit team examined:

- The AFP design (process leading to contract development and execution) - what was the process leading to the development of the AFP and how were the contract objectives and deliverables established;
- The design of management and control instruments in AFP - what are the managerial and control elements of the AFP and how were these executed in the course of the contract;
- The AFP evaluation/audit framework - what is the monitoring/evaluation/audit framework of the AFP; did the contract contain an evaluation/audit framework and how were these indicators monitored;
- The conformity of the AFP to provincial program management standards and guidelines; and,
- The intended deliverables and outcomes - what were the intended AFP deliverables and how were these to be measured.

3. Examination of AFP Operations:

Under this heading, the following areas were examined:

- Analysis of contract as management instrument and system for AFP operations - did the contract provide an effective management framework for the oversight of the AFP; and,
- Examination of AFP implementation of contract (service specifications in operational terms, variation) including:

    - Governance structure
    - Management of AFP (DOH, DOM, CDHA, MSNS, Dalhousie)
    - Operational controls
    - Financial structure and processes
    - Information systems
    - Provision for monitoring/evaluation/audit
    - Communications
    - Reporting framework.

4. Performance Management and Deliverables:

This component examined the performance management systems in place to effectively monitor and evaluate AFP activities. The question of "deliverables" for the DOM AFP was examined as a system of performance management indicators.

5. Examination of Contract Compliance:

This component of the evaluation assessed signatories' compliance with the terms of the AFP contract, and specifically examined the implementation of the following:

- Shadow billing (6.6) (2.14)
- Evaluation of academic (6.5)
- Maintenance of FTE's (6.3)
- Physician resource plan (9.1)
- Vacant FTE reporting (9.2)
- No MSI claims (11.2)
- Department Reports (12.0) (3.8)
- Payment to community-based physicians (11.4)
- Received Intra Provincial Bills (11.3)
- No community-based physician billing for institutional based work (11.1)
- Manpower Plan (3.5)
- CMPA Payments (3.11)
- On call services (3.10)

The evaluation utilized multiple research instruments including in-person interviews, documentation and financial report analysis, and drew on information and data obtained from the following sources:

- Documentation/records at DOH, DOM, CDHA, ABCC;
- Review of MIS and financial information;
- Interviews with program managers and division heads; and,
- Interview with Treasury Board officials.

Research areas were translated into evaluation questions, and an interview protocol developed. Interviews were held with over 40 officials and carried out by the audit team during the period September-November 2004. Respondent groups included:

- DOH officials;
- Dalhousie Faculty of Medicine and Department of Medicine senior officials;
- CDHA officials;
- MSNS (Doctors Nova Scotia) officials; and
- Nova Scotia Treasury Board officials.

4.3.2 Findings

The findings of the evaluation are summarized below. Recommendations to address some of the critical issues raised are presented in the following sections of the report.

4.3.2.1 CONFORMITY OF AFP WITH DOH/CDHA GOALS AND OBJECTIVES

AFPs are considered to be consistent with DOH goals and strategic vision. Nevertheless, there needs to be a stronger statement of how they are specifically linked to DOH goals. AFPs are seen as an effective alternative for FFS "piece work mentality", and encourage physicians to do "the right thing". AFPs are also seen to have assisted with recruitment and retention of specialists and have made the province more competitive. They offer physicians stability and security. As such, AFPs are seen as a positive measure and good public policy. There is still much work to be done in terms of developing specific deliverables, but things are seen to be moving in the right direction, and the process is said to have been initiated by the AFP partners. There was a need expressed by many respondents for better accountability for the DOM AFP, to show "where the money is going". Likewise, a better understanding of how the system is working, assessing the quality of care, and how the AFP has generally performed, are considered essential. As one respondent stated: "we don't know that the work is being done and we don't know who is doing the work". Some respondents suggested that ensuring accountability should be the role of the CDHA.

Demand for services is increasing, and waiting lists will grow, and as such, these are not considered optimal performance indicators of AFPs by several respondents. Resources are required at DOH to better monitor and manage AFPs; the DOH is considered by most respondents as "dramatically understaffed". There are only three individuals managing half a billion dollar program at DOH.

The lack of a provincial health human resource plan, upon which AFP staffing complements could be based, was acknowledged as an area of weakness. It was recommended that DOH should address this as a matter of high priority.

Generally, AFPs are seen as having been introduced into Nova Scotia before a clear vision of their goals was articulated. Several pointed to the lack of documentation from DOH describing objectives of AFPs.

However, the AFP was seen by most respondents as having contributed to the stability of recruitment and retention problems; to the strengthening of the academic environment and to an enhancement of patient care where quality took precedence over volume. The AFP contributed to the viability – some even suggested the "survival" - of the Department of Medicine. Some physicians within DOM were of the opinion that, without the AFP, the DOM may not have survived because of the practice of some divisions of subsidizing others, as a result of the manner in which the overall medical fee structure had been designed. There were suggestions that some of the major services may have ceased to exist within the DOM. For the first time, some divisions are operating at full complement. Retention of graduating residents has improved considerably and the improvement in quality teaching time has been noted by the Royal College. Protected research time has increased considerably and this has had a favorable impact on researchers and on under-graduate and post-graduate educational activities.

There was consistent favorable comment regarding the Department of Medicine's ability to work in a much more integrated manner, to provide "more appropriate" care, to delegate work to non-physicians in a fashion not possible under fee-for-service. With the removal of pressure to maximize patient volumes, an effective triage system has been implemented throughout the DOM, with standards for prioritizing patients based on acuity and with standard wait times assigned to each category. The AFP is considered to have contributed significantly to the development of this triage system and to the collaborative teamwork approach which it promotes.

Recommendation

DOH Physician Services Group resources should be increased to manage AFPs more effectively. This should include contract management, productivity and compliance monitoring of clinical outcomes, performance management, stakeholder satisfaction,

financial administration, etc. The management of AFP at DOH should be done with the collaboration of physician services, finance, policy, and information systems. A minimum of two specialist managerial positions should be included in the increased complement accompanied by adequate clerical/system support.

Rationale: It is estimated that by fiscal year 2004/ 2005, AFPs will represent approximately $178M in alternate funding initiatives, out of a total physicians services budget of $500 M, constituting close to 40% of this budget. The move away from FFS to AFPs has created a gap in the control mechanisms which have been in place under ABCC. AFP performance is not currently being monitored in the same fashion as FFS data. The introduction of AFPs as a funding mechanism for physician services requires a new performance management model which brings into play contract design and development, output monitoring, compliance with contract deliverables, clinical outcomes monitoring, stakeholder satisfaction, reporting and course adjustments. As such, AFPs require a new management system, which needs to be supported by appropriate management resources at DOH. Physicians' services staffing pre 2002 was considerably larger than the current complement. In view of the fact that the physicians' services budget has increased annually, that more AFPs have been introduced, and that the complexity of managing AFPs is greater than FFS administration, there is a requirement for a substantial increase in human resources to manage physician services. In addition, there is a requirement for integration of existing management information systems, as well as the introduction of new information systems to support AFPs.

4.3.2.2 EXAMINATION OF AFP DEVELOPMENT PROCESS

The development of the AFP was seen as a "flawed process", led by the former Deputy Minister, who took control of the negotiations and agreement. Several respondents referred to the "end-runs" in the negotiations, where "deals" were made. The process was seen to lack transparency and coherence. Department of Health managers described themselves as being required to implement a contract in which they had not designed and had concerns about.

There were concerns expressed that the AFP creates an environment where integration of services may be put at risk, that AFPs will become "legal entities within the system", to quote one respondent. Expert legal advice has been sought on both sides in this regard, emphasizing the concerns being experienced. As mentioned elsewhere in this report, not all the parties to the AFP consider themselves as having been full participants in the negotiating process. "The first AFP was seen as a major accomplishment. However, those of us responsible for carrying it out had no say in it", is an example of the uneasiness expressed by one senior CDHA staff member.

The manner in which the AFP process was initiated is also not considered to have enabled CDHA to work toward an integrated and collaborative approach toward deliverables and evaluation. As a consequence, the Department of Medicine and CDHA reports on clinical and academic outputs are not fully coordinated. The DOM's annual report information is not

generally incorporated into that of the District. There remains a disconnect on the matter of administrative overhead allocation; furthermore, there is evidence that the District is not a full player when recruiting decisions are made by the Department, exacerbating differences over the funding of administrative support when additions occur.

The AFP signatories were to develop deliverables and performance indicators, and did not come to an agreement on this matter. The work of DOM in collecting and reporting information was acknowledged by many respondents as a very positive step. The DOM AFP is considered the most effective of the AFPs, as compared with others in Nova Scotia and elsewhere in Canada. The lack of leadership provided by DOH was noted by some respondents, and the importance of a transparent and inclusive process for future negotiations of AFPs was emphasized. Reference was made to "an absence of vision". It was emphasized that partners needed to work together to demonstrate accountability. The lack of coherence and transparency, as well as the ambiguity of expectations, are some of the reasons for expectations which are not shared by all parties. Respondents were unanimous in their concern that performance standards and definitions needed to be included in future contracts, for the sake of clarity.

The parties were to have developed deliverables within an activity framework, but efforts in this direction "have happened with the District and Dalhousie only minimally", as was reported by DOM. Parties seemed to be generally unclear about the expectations in terms of "deliverables", with some referring to the framework as the deliverable. There is a need for stronger leadership in the identification of what constitutes deliverables, with a coherent process, clear definitions and examples provided.

It was stressed that all signatories should be involved in future negotiations, and have a say in contract content and wording. The prospect of a single AFP was also discussed by some respondents, with common administration and infrastructure support, which would allow for "huge efficiencies".

Recommendations

All future AFPs should include a clear accountability/evaluation framework, against which performance can be measured.

Rationale: DOM had put the model for the accountability framework forward, with the expectation that the deliverables would be developed. In order to meet the requirement of the provincial accountability framework, specific deliverables, and the evaluation process must be developed in all future AFPs to increase transparency and accountability.

There should be a greater Dalhousie FOM involvement in the AFP planning and negotiation processes, and in definition of deliverables.

Rationale: Interviews have established that there were no requests made to Dalhousie FOM to identify the academic portion of deliverables, nor was FOM consulted with regard to academic component of the accountability framework (Schedule C of the AFP).

DOH and DOM should take steps to ensure that the finalized AFP contract is produced and executed in a more timely fashion.

Rationale: The AFP contract documentation indicates that the negotiations were finalized in June 2002. Interviews disclosed that negotiations carried on after this date into the fall of 2002, with a final signed document not being available until May 2003. These long delays resulted in the need for retroactive payments, as well as physician resource adjustments, which costs could have been avoided. It was further pointed out to the audit team that the delays in the negotiation process had a negative effect on recruitment, and that several likely faculty prospects were lost as a result of not being able to obtain confirmation of funding, even through DOH had acknowledged informally that the positions were needed.

DOH should review its negotiation process and procedures to ensure that there is a clear understanding of objectives, authorities, communications and specific roles of the participants.

Rationale: The project interviews have revealed that the AFP negotiation process was not done in a structured, coherent, nor coordinated manner, with the roles of the various participants not clearly understood. This resulted in less than optimal utilisation of the negotiation process and outcomes. Efforts should be made to improve working relationships among AFP stakeholders through clarity of expected outcomes, deliverables and processes. Interviews have clearly shown that there is a lack of effective communications among the parties and a lack of confidence, which should be addressed.

The terms of the CDHA contribution to the AFP should be fully complied with (ref. Contract 8.7, Schedule G).

Rationale: There is a difference of opinion among DOM and CDHA as to whether CDHA is fully compliant with its obligations under the current contractual agreement. The terms of CDHA support need to be clearly understood by all parties and implemented as per the terms of the contract.

The DOH, in conjunction with CDHA, should examine the impact of underutilization of hospital facility capacity and the resulting impact on patient through-put, wait times and physician morale.

Rationale: Interviews with the leadership in the DOM and CDHA have led to the conclusion that patient through-put and wait times are being negatively impacted by underutilized facility capacity. As well, the frustration expressed by Division Heads at not being able to respond effectively to referral requests because of budget limitations is leading to an attitude in some quarters that discourages "going the extra mile".

Stronger participation by CDHA in operationalisation of AFP is required.

Rationale: CDHA has the ultimate responsibility for health delivery and health outcomes in its defined catchment area. Interviews have shown that there is not as much of an interconnect between CDHA and the DOM from an operation point of view, as had been intended, specifically with respect to resource allocation, physician resource planning and integration of information systems.

There should be more shared administration and shared services among all FOM AFPs to promote economies of scale and cost savings (see omnibus AFP recommendation).

Rationale: Given the expansion of AFPs within the CDHA, the DOH and CDHA should examine the concept of shared services for multiple AFPs, rather than duplication of support services and higher administrative costs.

4.3.2.3 AFP OPERATIONS

These were described as "relatively poor by all parties", according to several respondents. The lack of resources at DOH was again underlined, as was the weakness of the current information systems. Processes, standards and reporting formats need to be developed by DOH so that there is consistency and comparability of information. There need to be provincial guidelines for how AFPs are managed. The role of the Governance Committee became a forum for negotiations, as opposed to a management committee. The Governance Committee is not generally considered to be working well by most respondents; one respondent described it as "ineffectual". It was suggested that the terms of reference of the Governance Committee should be reviewed and it should be given a clearer mandate to manage the AFP. AFP management was described by one respondent as "management by crisis", with no clear vision of the "big picture". Shadow billing is seen to be a necessary evil, until such time as a better information system is developed. Shadow billing is recognized not to capture the range of activities covered by AFP physicians.

This lack of clarity and collegiality has led to an "environment of suspicion" by all parties, which is considered counterproductive.

Many respondents believed that CDHA should have a stronger role in the management of AFPs, and in the determination of the FTE complement for the DOM.

Department of Medicine internal reports are viewed by many respondents as a good initiative toward achieving overall quality assurance measurements; still, it is claimed that much more remains to be done in order to effectively capture and measure AFP performance. The CDHA has developed a complementary framework for evaluating its own results using the dimensions of access, safety, cost and quality. The intention is to apply this process to all AFPs.

A lack of confidence was expressed in the reporting systems currently in use. The section on information systems in this report underscores substantial shortcomings in the District's ability to manage its affairs adequately. Shadow billing is described as "a useless exercise in futility with no obvious benefit". Moreover, concerns were expressed that the type of expensive management information system now employed by the DOM will be duplicated by other departments falling under AFPs.

There were other concerns expressed as well. Clinical earnings are seen in some quarters as still being used to subsidize academic activities. Several of the Divisions feel they continue to be underpaid relative to national standards. Shadow billing is generally held in low esteem. It is claimed that with the introduction of the AFP, some specialists have opted not to perform procedures which had previously been attractive under fee-for-service. Comments were made that a form of incentive should be considered for some specialties given the nature of wait times, especially those impacted by changes in demographics and new clinical standards and protocols. Frustration was evident that, in some cases where wait times were excessive, facilities within the CDHA were underutilized because of budget restrictions.

Respondents were unclear about what the reporting expectations were to be, and in what format. DOM had received "very little feedback" on the information it submitted in its annual reports, and was assuming that this information was satisfactory. The CDHA and DOM annual reports were not integrated nor consistent, causing the DOH to question their reliability. Other respondents were equally unclear about reporting requirements and expectations. While considerable work has been achieved in data collection and analysis, clearer overall direction must be provided to ensure that information collected is relevant and useful for AFP management decisions. Parties must continue to work collectively to achieve this clarity and focus.

Recommendations

Role and terms of reference of the Governance Committee should be reviewed, and its objective should be oriented to more of a management board.

Rationale: It would be advisable to have an AFP Management Board, responsible for compliance, performance monitoring of deliverables, dispute resolution, make recommendations, and resource planning.

DOH should be a full member and chair of Governance Committee.

Rationale: DOH should be a full and regular participant in the governance of the AFP.

That AFPs be based on more reliable forecasting of physician resources, than has been the case in the past.

Rationale: In fiscal year 03/04, DOM added five specialists to the roster, of which three had not been included in Schedule F, for which the Minister's Funding was provided. This was ultimately approved and funded by DOH. According to the AFP contract, CDHA is required to provide administrative and non-clinical medical service delivery funding for each new physician appointment. In the case of the three new unplanned appointments, CDHA would be unable to provide for these costs, which have been unbudgeted.

That a more logical, realistic and accurate AFP model of funding be developed to capture current information that relates to physician remuneration. That DOH invest the required time and resources in the development of the AFP model of funding to effectively engage in meaningful negotiations.

Rationale: The DOH and the MSNS did not follow the Principles document that they had signed in 2002, notably, the funding principles provided for under that document. The DOM submission for the renewal of the AFP was in accordance with the established funding principles, but was requesting what was thought at the time by DOH to be excessive resources. The renewed DOM AFP not only provided additional funding, linked to the physician human resource complement, but also provided for an increase in the rate paid per FTE, which was far in excess of the increases provided for under the Master Agreement or any other AFP at that time. Such an AFP FTE rate adjustment had a ripple effect on all linked AFPs and new AFPs, which were then under negotiation. It is likely that this situation would not have occurred had there been a clear and accountable authority structure for AFP approvals.

The audit team recognizes that the DOM AFP was renegotiated by the DOH and in particular physician services, at a time of significant reorganization at the DOH. Nevertheless, the need for a coherent and meaningful data to support the process must be underlined.

To promote greater efficiency in access to and in the delivery of clinical services by medical specialists, that the DOH examine the possibility of developing financial incentives for performance within the AFP funding structure.

Rationale: In interviews with Division Heads, the team was told that the AFP is not flexible in encouraging physicians to perform more work. The DOH should consider developing performance incentives within the AFP and creating a performance based compensation system to encourage increased productivity.

4.3.2.4 PERFORMANCE MANAGEMENT, DELIVERABLES AND INDICATORS

The audit process was seriously limited by the fact that the AFP Contract did not contain a formally agreed upon set of measurable deliverables (Schedule D of the Contract – Agreement as to the Deliverables - is blank).

While the Department of Medicine has developed baseline activity data and an accountability framework (Schedule B of the Contract – Baseline Activity Data and Accountability Framework), which was to provide the basis for the development of the delivery and evaluation system for the AFP, the parties never agreed upon a set of deliverables. Therefore, as a result, the evaluation system for those quantifiable deliverables was never developed.

The agreement contemplated a collaborative effort by the parties to develop the deliverables. While the project team found evidence that the DOM did initiate discussions in an effort to have the deliverables defined, and did provide an annual report which detailed its activities on a divisional level, and in accordance with the activity categories in the accountability framework, the project team found no evidence that the DOH or the other signatories had undertaken efforts in this direction.

Accordingly, there are only activity reports provided by DOM in its annual reports [***Department of Medicine Composite Report of AFP Indicators and Innovations, 2002/03***]. DOM has committed substantial time and resources in the preparation of these annual reports, for which it is to be commended. These activity reports, however, while informative and helpful, are merely descriptors of divisional activity. As there have been no performance targets set, against which these activities can be measured, or benchmarks, these activities cannot be considered performance indicators. These activity descriptors do not allow for an analysis nor provide the information that the infusion of more physicians or financial resources have resulted in improved

access or quality of care under an AFP. Nor do they give enough insight into the many initiatives which have resulted in improved health care which would not likely have been possible under a FFS environment, such as team based health delivery, telemedicine, outreach clinics, and email consultations.

It must be pointed out that the DOM AFP is not unique to this situation. In fact, the DOM AFP is the only AFP to contain an accountability framework. DOH, in negotiating AFPs since the mid-1990s has indicated a commitment to the development of AFP deliverables, yet there is no evidence that any progress has been made on this front. This may be attributable to the degree of organizational change within DOH and the current lack of adequate resources in the Physician Services group.

Specific deliverables and the ability to measure them are the cornerstones of the AFP. Consequently, the design and implementation of a set of quantifiable AFP performance based deliverables, and the supporting information system, which would provide more meaningful descriptions of the full range of DOM activities and which set specific performance targets, is required. Measurable deliverables will allow all parties to appropriately determine the true value of the AFP and make AFPs more transparent to the public. Future AFPs should not be implemented until such time as the required deliverables are well established, with specific performance targets set.

Deliverables should not be static, but should be evolving and reflective of the current realities and pressure of the health care system. It is in the best interest of the current signatories to jointly develop a set of meaningful DOM AFP performance indicators.

4.3.2.5 EXAMINATION OF CONTRACT COMPLIANCE

The DOM AFP under audit, signed in May 2003, is very specific in describing the commitments of the various parties to the agreement. The audit team's examination reviewed the extent to which these responsibilities have been met by the signatories. The method used included examination of pertinent records and documentation, interviews with relevant officials and written responses to questions posed.

Throughout the body of the audit report are references and findings which relate both directly and indirectly to the compliance issue. The following Table (7) represents a summarized version of these findings.

Table 7 Summary of Compliance Findings

Article	Description	Status
3.1.1	Minister's funding	Schedule "F" is very clear on the amounts to be added to the AFP as new agreed upon positions are filled. There are set rates for specialists and family physicians. Nevertheless, DOH has continued to fund new positions on the basis of a calculation it provided on Nov. 22, 2002 which contains payment schedules not in accordance with Schedule "F". While the Minister appears to be somewhat in compliance, the record trail is convoluted and represents a serious impediment to effective analysis and audit.
3.1.2	Minister to identify portion of allocated funding to Special Increment For Teaching [SIFT]	There is no evidence of the Minister ever making this distinction.
3.4	The absence of formula, contract expires March 31, 2004	Contract has been extended by correspondence between DOH and DOM.
3.5	Development of Physician Resource Plan	Not complied with
3.7	Suspension of members' billing numbers and billing arrangements.	Requirements are not fully understood by the parties and there has not been any suspension of billing numbers by ABCC
3.8	Annual reports by DOM to DOH on physician payments	Report for 3-31-03 submitted; 3-31-04 report outstanding.
4.1	Administrative contribution by the parties.	No formalized process or agreement has been reached.
5.1	Governance Committee	Meeting requirement complied with. No annual reports.
6.2	Framework for Deliverables and Evaluation.	Not complied with

Table 7 Summary of Compliance Findings (Continued)

Article	Description	Status
6.3	[Related to 9.2] DOM required to report on vacancies exceeding 90 days. Funding adjustment required under certain circumstances.	Vacancy reporting by DOM complied with. Funding not adjusted when required under the contract. DOM does not provide requisite workload performance information to DOH to justify funding continuance.
6.4	Review and documentation of DOM participation in District, Regional and Provincial policy, planning and operational management.	Technically not complied with. The lack of any provincial assessment of needs and physician resource plan have been contributing factors.
6.5	Periodic review of academic activity	DOM and Faculty of Medicine review academic activities on a regular basis. Impediment is lack of comprehensive recording and reporting system.
6.6	Mandatory shadow billing	Not complied with
6.7	Semi-annual meetings to assess impact of AFP	No evidence of any formalized process to assess impact.
6.8	Implementation of advance implementation methodologies	Partial compliance. Semi-annual reporting of above to Governance Committee prior to implementation
6.9	Governance Committee to meet and review divisional workload	No recording of Governance Committee minutes to show formalized process.
7.0	Dalhousie funding: annual contribution: - Annual contribution - Clinical academic budget - Clinical scholar awards	Degree of compliance is questionable. Evidence exists that DOM subsidizes Dalhousie University through the AFP funding.
8.2	CDHA provision of physician offices	Complied with.
8.3.1	CDHA provision of administrative funding	Complied with in principle. DOM claims CDHA "owes" it the equivalent of 5.5 FTE administrative positions.
8.4	CDHA provision of clinical associates and physician extenders	Complied with.
8.7	CDHA funding support for new physicians	See 8.3.1

Table 7 Summary of Compliance Findings (Continued)

Article	Description	Status
9.1	DOM to maintain physician resource plan in collaboration with CDHA and DOH (SEE ALSO 6.4)	Not complied with. No complete correlation of DOM plan with CDHA physician plan. DOH HHR plan does not exist.
11.1	Sch. "C" Member physician declaration regarding MSI billing	No evidence that Schedule "C" is not being complied with. However, in order to determine whether community-based physicians fully comply with this regulation would require a detailed examination of individual billing practices far beyond the scope of this audit.
11.2	Reduction in funding when AFP physician bills MSI	Not complied with. (Wording states that Minister "may" deduct.)
12.1.3	Annual report by DOM to DOH re: physician complement, status and Revenue share. [See also 3.8]	Report outstanding for March 31, 2004
16.1.6	Payment of benefits to physicians	Duplicate funding being provided by DOH; to MSNS and DOH
18.1	Declaration by physicians – Schedule "C"	Not fully complied with. The audit team found inappropriate usage of QE11 forms versus CDHA. Also, there is no central repository at DOH containing current listing of DOM physician membership and related Schedule "C" forms.

Recommendation

The process for the determination of the specific number and type of FTEs required by the DOM should be subject to a more coherent and transparent process, and be fully supported by CDHA and Dalhousie FOM, before being submitted to DOH for approval.

Rationale: According to interviews, while evidence was found of attempts to improve the relationship between CDHA and DOM with respect to the development of the physician resource plans, especially with respect to when requests are being submitted to the DOH for additional resources, this process needs a stronger involvement of CDHA. Since teaching and research activities in the DOM represent in the area of 23% of FTE allocations, Dalhousie Faculty of Medicine should have a stronger role in decisions pertaining to the academic complement. The resources required also need to reflect a provincial HHR plan.

5.0 RECOMMENDATIONS

This section consolidates all of the recommendations contained throughout this report; groups them by issue; and, presents their supporting rationale.

I. POLICY ISSUES

1. **In view of the benefits to the Nova Scotia health care system provided through the DOM AFP, that DOH should continue to provide funding of the DOM through an Alternative Funding Plan.**

Rationale: The audit study and survey results have demonstrated the many benefits which the DOM AFP has provided, including: enhanced specialist recruitment and retention; a strengthened academic program; more appropriate and high quality patient care; integrated team-based provision of services; more collaborative and community-based delivery; which could not have been possible under a FFS system. The high quality of care provided by DOM was also emphasized by the survey response. In light of this supporting evidence, it is recommended that AFPs continue to be implemented with academic based specialist departments, with the proviso that the appropriate control and management mechanisms be put into place to manage AFPs.

2. **DOH should develop a stronger statement of its AFP policy and its policy objectives for AFPs, linked to the DOH Strategic Direction and Business Plans.**

Rationale: AFPs need clearer and a more coherent policy direction in the provincial health strategy and could benefit from a stronger strategic direction.

3. **DOH should develop an overarching policy for Alternative Funding Initiatives, and make a clear differentiation between Alternative Funding Initiatives and Alternative Funding Plans; and to further distinguish Academic AFPs from regular AFPs. Standardization of funding models should be examined.**

Rationale: The various AFI/AFP models should be clarified and their different policy directions and objectives understood. For example, academic funding plans, physicians alternative funding (e.g. pediatricians in Annapolis Valley); alternative funding initiatives (nurse practitioner/physician teams); emergency room funding; and other categories (rural stabilization funding) all have different policy objectives and funding models. These models are not standardized across the province and would benefit from better defined policies, goals and objectives, as well as evaluation mechanisms. The AFP was intended to promote a better alignment of the performance of the clinical departments with the goals of CDHA.

4. **DOH should consider implementing an Omnibus AFP for the entire Dalhousie Faculty of Medicine, containing separate funding provisions for various specialties, but ensuring common administrative support, relevant academic support, common managerial provisions, and deliverables applicable to each specialty area.**

Rationale: to enable more administrative and cost effective management of AFPs, including standardization of policies, operations, reporting systems, and financial administration. An omnibus AFP would furthermore support more effective integration and management of clinical services at CDHA and IWK.

5. **Funding streams for the educational components of the AFP should be revisited and jointly reviewed by DOH and the Department of Education to clarify funding responsibilities. DOE funding commitments should be clearly identified in the relative funding allocations for clinical and academic activities.**

Rationale: Although the **Principles** document (2002) is of no force and effect after March 31, 2004, there was, as with the first AFP, a lack of compliance with respect to the funding responsibilities established in this document. Currently, the DOH is funding, through the AFP, clinical services, teaching, research and administration. The Physician Services funding is thus subsidizing educational activities at Dalhousie DOM. There is a common understanding between DOH and DOM that the AFP funding was to include clinical and non-clinical activities. Verbal reports vary from 80:20 to 70:30 (clinical/non-clinical ratio). While clinical teaching may be considered a component of an academic AFP, academic (i.e. classroom) teaching and research activities ought to be reexamined and funding responsibility established. A decision needs to be made with respect to which DOM activities are funded by DOH. Deliverables for educational and research activities should be clearly articulated by the governmental department which has responsibility for that mandate.

6. **AFP human resource management should be based on a provincial DOH health human resource plan to ensure that medical resources reflect and support clearly-stated provincial and regional population health needs**.

Rationale: The DOM AFP has promoted a change in traditional practice patterns, including an increase in team delivery of clinical services, and a greater reliance upon physician extenders and clinical nurse associates. Accordingly, a revitalized HHR plan for health professionals, which is based on service needs, rather than professional bodies, is called for. The DOM physician resource plan, by specialty, needs to be developed, and must be based upon provincial and regional population health needs.

7. **AFP deliverables should be immediately developed by AFP partners within an established timeframe. The process should be led by DOM and CDHA, and subject to approval by DOH.**

Rationale: The lack of clearly defined and stated deliverables has a major impact on performance management of the DOM AFP. Currently, there is insufficient correlation between AFP deliverables and CDHA goals and objectives. AFP stakeholders should immediately begin the process of developing an accountability and evaluation framework, with specific deliverables, performance indicators and productivity targets.

8. **All future AFPs should include a clear accountability/evaluation framework, against which performance can be measured.**

Rationale: DOM had put the model for the accountability framework forward, with the expectation that the deliverables would be developed. In order to meet the requirement of the provincial accountability framework, specific deliverables, and as evaluation process must be developed in all future AFPs to increase transparency and public accountability.

9. **DOH should determine the formula between clinical and non-clinical funding in all future AFPs to ensure clarity of expectations and deliverables.**

Rationale: The absence of this formula in the existing AFP has raised differences in opinion about what the expectations are among all of the signatories.

II. PROCESS/CONTRACT RELATED ISSUES

10. **Given the dollar value of the DOM AFP, specific authorities and processes should be well established for future AFPs, documented and approved. Formal approval should be also be provided by Treasury and Policy Board and/or the Department of Finance.**

Rationale: There is no documentation in the DOH detailing the process and structure of DOM AFP negotiated funding and rationale for the dollar changes and the additional FTEs added**.** The audit team was informed that many components of the DOM AFP were negotiated and agreed to in undocumented closed bilateral meetings between the previous Deputy Minister of Health and the Head of DOM. No files or documentation could be found to support agreements that were said to have been reached. This lack of accountability and documentation pose a serious problem for current DOH managers and compromise value for money for public expenditures. Without this documentation and its rationale, it is impossible for the province to determine value for money.

11. There should be a greater Dalhousie FOM involvement in the AFP planning and negotiation processes, and in definition of deliverables.

Rationale: Interviews have established that there were no requests made to Dalhousie FOM to identify the academic portion of deliverables, nor was FOM consulted with regard to academic component of the accountability framework (Schedule C of the AFP).

12. DOH and DOM should take steps to ensure that the finalized AFP contract is produced and executed in a more timely fashion.

Rationale: The AFP contract documentation indicates that the negotiations were finalized in June 2002. Interviews disclosed that negotiations carried on after this date into the fall of 2002, with a final signed document not being available until May 2003. These long delays resulted in the need for retroactive payments. It was further pointed out to the audit team that the delays in the negotiation process had a negative effect on recruitment, and that several likely faculty prospects were lost as a result of not being able to obtain confirmation of funding, even through DOH had acknowledged informally that the positions were needed.

13. DOH should review its negotiation process and procedures to ensure that there is a clear understanding of objectives, authorities, communications and specific roles of the participants.

Rationale: The project interviews have revealed that the AFP negotiation process was not done in a structured, coherent, nor coordinated manner, with the roles of the various participants not clearly understood. This resulted in less than optimal utilisation of the negotiation process and outcomes. Efforts should be made to improve working relationships among AFP stakeholders through clarity of expected outcomes, deliverables and processes. Interviews have clearly shown that there is a lack of effective communications among the parties and a lack of confidence, which should be addressed.

14. The process for the determination of the specific number and type of FTEs required by the DOM should be subject to a more coherent and transparent process, and be fully supported by CDHA and Dalhousie FOM, before being submitted to DOH for approval.

Rationale: According to interviews, while evidence was found of attempts to improve the relationship between CDHA and DOM with respect to the development of the physician resource plans, especially with respect to when requests are being submitted to the DOH for additional resources, this process needs a stronger involvement of CDHA. Since teaching and research activities in the DOM represent in the area of 23% of FTE allocations, Dalhousie Faculty of Medicine should have a stronger role in decisions

pertaining to the academic complement. The resources required also need to reflect a provincial HHR plan.

15. **With respect to the provisions relating to the 90 day vacancy clause, DOH must ensure that payments to the DOM should not continue beyond the 90 days, unless the vacated positions has been replaced. Payment should not be reestablished until DOH and DOM have developed a mechanism to ensure that the contracted level of activity is being maintained**.

Rationale: Although the AFP provides for automatic payment for the first 90 days of a vacant position, payment beyond the 90 days has continued in the absence of adequate documentation that clinical activity has been maintained.

16. **With respect to the provision relating to the 45 day vacancy clause, DOM should fully comply with its reporting requirements.**

Rationale: The provision in the contract (9.2 of the AFP) is that DOH will be notified when a department physician is absent for a period longer than 45 days. The audit has indicated that the DOM doesn't report the 45 day vacancies, and is non-compliant with the contract. As well there is no restriction on the reason for an absence or how long the absence can continue. Current provisions require no substantiation that clinical activity has been maintained.

17. **In future AFP contracts, the same reporting requirement that currently apply to 90 day vacancies should be made to apply to 45 day absences.**

Rationale: The current AFP contract is silent on the matter of requiring proof that workload in DOM does not decrease during absences. This creates an accountability and control problem for AFP managers.

18. **DOH should consider, in the renewal of the AFP, which absences should be funded and for what period of time.**

Rationale: The provision in the contract for (9.2 of the AFP) is that DOH will be notified when a department physician is absent for a period longer than 45 days. The audit has indicated that the DOM doesn't report the 45 day vacancies, and is non-compliant with the contract. As well there is no restriction on the reason for an absence of how long the absence can continue. Current provisions require no substantiation that clinical activity has been maintained.

19. **DOH should consider, in renewing the AFP, that funding for absences due to maternity is already provided through other benefit plans funded by DOH.**

Rationale: DOM currently provides a maternity leave benefit to physicians within the AFP. There are no restrictions in this area within the AFP other than the requirement for the DOM to report absences greater than the 45 days. The Province currently provides monies to the Medical Society of Nova Scotia through the Master Agreement for a benefit plan which covers, among other things, maternity benefits. Under the current AFP, the DOH is actually double funding maternity leaves for DOM physicians in the AFP.

20. DOH should consider, in renewing the AFP, that the DOH is currently funding a benefits plan for physicians through the MSNS.

Rationale: The audit team noted that DOM provides a Group Insurance Plan to employees of the University Internal Medicine Clinic and ACADOM, legal entities within the DOM. The audit team was advised that benefits from this plan are extended to physicians within the AFP. DOH provides funds to the MSNS through the Master Agreement to provide a benefit plan which includes many of the benefits includes in the DOM plan. As noted, this is a situation where the DOH is funding two organisations for benefit plans.

21. The terms of the CDHA contribution to the AFP should be fully complied with (ref. Contract 8.7, Schedule G).

Rationale: There is a difference of opinion between DOM and CDHA as to whether CDHA is fully compliant with its obligations under the current contractual agreement. The terms of CDHA support need to be clearly understood by all parties and implemented as per the terms of the contract.

22. The DOH, in conjunction with CDHA, should examine the impact of underutilization of hospital facility capacity and the resulting impact on patient through-put, wait times and physician morale.

Rationale: Interviews with the leadership in the DOM and CDHA have led to the conclusion that patient through-put and wait times are being negatively impacted by underutilized facility capacity. As well, the frustration expressed by Division Heads at not being able to respond effectively to referral requests is leading to an attitude in some quarters that discourages "going the extra mile".

23. Stronger participation by CDHA in the operationalisation of AFP is required.

Rationale: CDHA has the ultimate responsibility for health delivery and health outcomes in its defined catchment area. Interviews have shown that there is not as much of an

interconnect between CDHA and the DOM from an operational point of view, as had been intended, specifically with respect to resource allocation, physician resource planning and integration of information systems.

III. MANAGEMENT ISSUES

24. DOH Physician Services Group resources should be increased to manage AFPs more effectively. This should include contract management, productivity and compliance monitoring of clinical outcomes, performance management, stakeholder satisfaction, financial administration, etc. The management of AFPs at DOH should be done with the collaboration of physician services, finance, policy, and information systems. A minimum of two specialist managerial positions should be included in the increased complement accompanied by adequate clerical/system support.

Rationale: It is estimated that by fiscal year 2004/ 2005, AFPs will represent approximately $178M in alternate funding initiatives, out of a total physicians services budget of $500 M, constituting close to 40% of this budget. The move away from FFS to AFPs has created a gap in the control mechanisms which have been in place under ABCC. AFP performance is not currently being monitored in the same fashion as FFS data. The introduction of AFPs as a funding mechanism for physician services requires a new performance management model which brings into play contract design and development, output monitoring, compliance with contract deliverables, clinical outcomes monitoring, stakeholder satisfaction, reporting and course adjustments. As such, AFPs require a new management system, which needs to be supported by appropriate management resources at DOH. Physicians' services staffing pre 2002 was considerably larger than the current complement. In view of the fact that the physicians' services budget has increased annually, that more AFPs have been introduced, and that the complexity of managing AFPs is greater than FFS administration, there is a requirement for a substantial increase in human resources to manage physician services. In addition, there is a requirement for integration of existing management information systems, as well as the introduction of new information systems to support AFPs.

25. When AFPs are introduced, DOH should develop an effective communications strategy to inform referring physicians, administrators, and the general public, about changes and results.

Rationale: There is lack of a full understanding within the province when AFPs are introduced, with respect to their impact on the health care system, expectations, changes, referring practices.

26. There should be more shared administration and shared services among all FOM AFPs to promote economies of scale and cost savings (see omnibus AFP recommendation).

Rationale: Given the expansion of AFPs within the CDHA, the DOH and CDHA should examine the concept of shared services for multiple AFPs, rather than duplication of support services and higher administrative costs.

IV. GOVERNANCE ISSUES

27. Role and terms of reference of the Governance Committee should be reviewed, and its objective should be oriented to more of a management board.

Rationale: It would be advisable to have an AFP Management Board, responsible for compliance, performance monitoring of deliverables, dispute resolution, make recommendations, and resource planning.

28. DOH should be a full member and chair of Governance Committee.

Rationale: DOH should be a full and regular participant in the governance of the AFP.

V. ADMINISTRATION

29. In renewing the AFP, the parties should ensure that the wording of Article 3.7 (or its successor) regarding membership in the DOM is reviewed to ensure the intent of the provision – that all relevant specialists are in the AFP or the funding will not apply.

Rationale: Under the current AFP, there is lack of clarity about AFP DOM membership and what this constitutes. The AFP stipulates (section 3.7) that DOH funding only applies if all DOM physicians are opted in and participate in the DOM practice plan. At the time of the AFP, the DOM was intended to be the DOM within the QEII Health Sciences Centre. The AFP under audit, however, is a District AFP, since not all physicians in the specialties of the divisions of the DOM are within the Department of Medicine practice plan, and therefore the definition of "the DOM" has become blurred. This fact results in a situation where all not physicians are opted into the AFP. It is therefore possible to have specialists-within the same hospital (e.g. Dartmouth General Hospital) billing FFS, while others are paid through the AFP. This is contrary to the intent of the AFP and creates a substantial problem from a control point of view.

30. DOH should review the practice of including community-based physicians in AFPs. The parties to the AFP should reach agreement about who should be allowed to make claims against MSI and under what circumstances.

Rationale: For greater clinical and financial control, and to reduce the practice of part-time AFP members billing under FFS and being paid through the AFP envelope, the inclusion of community-based or part-time specialists being in the AFP should be reviewed. The understanding at DOH is that all community-based physicians are .5 or less. Several jurisdictions in Canada have adopted the practice of having all members of a university-based department "opt in" or "opt out", with no part-time physicians being funded by both systems simultaneously.

31. Until a replacement information/performance management system is designed and implemented, compliance with shadow billing requirements by the DOM, as defined in the contract, should be ensured, with payment transfers conditional upon compliance by all members of the AFP

32. DOH should ensure that the required resources are available to adequately monitor AFP shadow billings and analyse ABCC reports. Reports should provide enough detail on clinical activity to determine if the AFP resources are contributing to health care improvements. ABCC reports should provided on a timely basis to ensure that the information being reviewed is relevant, allowing for corrective action, if necessary.

Rationale: A review of shadow billings confirmed that shadow billings, as a percentage of the Minister's funding, represented only an average of 68% over the term of the AFP. AFP partners should jointly address the design and development of an effective management information system to capture AFP activities. Responsibility for monitoring shadow billings should be clearly established, until a new information/reporting/ performance management system is in place.

33. All DOM shadow billings should be subject to a periodic risk analysis audit process by Atlantic Blue Cross, similar to fee for service payments.

Rationale: DOH did not provide ABCC with a clear mandate for audit of shadow billing activities. This should be immediately addressed by DOH, and shadow billings subjected to the same rigorous audit/analysis processes so as to monitor productively more effectively.

34. At the time of renegotiating the AFP, AFP physicians should be required to bill Fee for Service for out of province patients. The Minister's funding should be reduced by the projected amount of reciprocal billings for the contract period or on a per annum basis (for provinces other than Québec), taking in to account historical amounts and utilization. Reciprocal billings should then be moved to the provision of the AFP which deals with additional funding sources (current section 3.9).

Rationale: Notwithstanding that shadow billings is mandatory, interview information revealed that for a selected period, only 92% of patients were shadow billed, as well the same audit established that shadow billing was only 83% appropriately billed and 72% are complete. It is reasonable to assume that reciprocal billing would be similarly underreported with a resulting loss of revenue for the province.

35. DOH should establish clear rules with respect to billing procedures, communicate these rules to ABCC, and ensure that the necessary system safeguards are in place to properly administer the rules. The policies and procedures should also be contained within an operational manual which is made available to any person involved in the administration of the AFP.

36. Physician billing numbers of those who are not allowed to bill, should be clearly suspended; i.e. no billing of any form allowed under the billing system. DOH/ABCC should determine the billing rules for reciprocal billing and Section 3.9 of the AFP.

Rationale: There is a lack of formal instructions given by DOH to ABCC regarding the administration of DOM AFP. Interviews indicated that there is confusion with regard to the disposition of billing numbers and billing arrangements for the members of the DOM AFP, FTE requirement for additional FFS billing [ref. contract clause]. An operations manual should be developed for AFPs, with clear procedures, rules and regulations, reporting requirements, deliverables, etc.

Communications between DOH and ABCC should be strengthened and formalised with respect to AFP management (monitoring of billing numbers, physician complement, clarity of timelines for reporting shadow billings, documentation requirements, etc).

VI. MANAGEMENT INFORMATION SYSTEMS

37. A reporting system should be developed which recognizes the full range of activities undertaken under the AFP, including the roles of physician extenders, clinical nurse specialists, etc., in providing team-based patient care. The costs, as

well as the benefits, of these services should be identified in conjunction with the development of the AFP funding package.

Rationale: AFPs were designed to promote new approaches to providing patient care, which included telephone consultations, telehealth, physician extenders, clinical nurse specialists, more direct interface with community physicians, etc. This new team based practice style has not be fully recognized and reported, thereby making meaningful performance comparisons with FFS activities impossible. Costs associated with these services must form part of any value for money analysis. Existing FFS billing (shadow billing) does not capture any of the activities of these providers.

38. DOH, in conjunction with CDHA, should undertake a thorough analysis of the patient information systems currently employed at CDHA. Such analysis should include a summary of all the existing components, the associated costs, and ability to integrate etc.

39. That the AFP parties should develop a standardized information system to collect AFP information.

Rationale: At the moment, there are in excess of 35 separate systems in place at CDHA which collect patient information. Some of these are sizeable in nature, providing discreet data – e.g. STAR which deals with registration and bed utilization and PHIS, which handles ambulatory scheduling and bookings. At the same time, the majority of Divisions within the DOM add to the process by independently recording patient activity indicators for internal DOM reporting and performance analysis. Throughout, there is no evidence of the CDHA's ability to entirely reconcile its own data and that of DOM although efforts are underway to do so.

In any event, the existing system is fragmented, duplicative and expensive. A complete and thorough analysis is called for.

One of the significant performance indicators is wait times. In the DOM, a wait time is defined as the length of time between the date a patient is referred and the date the patient is seen by the specialist. If a patient has been referred, but not seen, this patient not included in wait time statistics because of the inability of the existing system to capture and collate this information. As such, wait times are understated.

The parties are reminded that, in accordance with section 6.2, the deliverables and evaluation system will include the data requirement and reporting mechanisms required by the parties.

VII. FUNDING/FINANCIAL ISSUES

40. That AFPs be based on more reliable forecasting of physician resources, than has been the case in the past.

Rationale: In fiscal year 03/04, DOM added five specialists to the roster, of which three had not been included in Schedule F, for which the Minister's Funding was provided. This was ultimately approved and funded by DOH. According to the AFP contract, CDHA is required to provide administrative and non-clinical medical service delivery funding for each new physician appointment,. In the case of the three new unplanned appointments, CDHA would be unable to provide for these costs, which have been unbudgeted.

41. That a more logical, realistic and accurate AFP model of funding be developed to capture current information that relates to physician remuneration. That DOH invest the required time and resources in the development of the AFP model of funding to effectively engage in meaningful negotiations.

Rationale: The DOH and the MSNS did not follow the Principles document that they had signed in 2002, notably, the funding principles provided for under that document. The DOM submission for the renewal of the AFP was in accordance with the established funding principles, but was requesting what was thought at the time by DOH to be excessive resources. The renewed DOM AFP not only provided additional funding, linked to the physician human resource complement, but also provided for an increase in the rate paid per FTE, which was far in excess of the increases provided for under the Master Agreement or any other AFP at that time. Such an AFP FTE rate adjustment had a ripple effect on all linked AFPs and new AFPs, which were then negotiation. It is likely that this situation would not have occurred had there been a clear and accountable authority structure for AFP approvals.

The audit team recognizes that the DOM AFP was renegotiated by the DOH and in particular Physician Services, at a time of significant reorganization at the DOH. Nevertheless, the need for a coherent and meaningful data to support the process must be underlined.

42. To promote greater efficiency in access to and in the delivery of clinical services by medical specialists, that the DOH examine the possibility of developing financial incentives for performance within the AFP funding structure.

Rationale: In interviews with Division Heads, the team was told that the AFP is not flexible in encouraging physicians to perform more work. The DOH should consider

developing performance incentives within the AFP and creating a performance based compensation system to encourage increased productivity.

43. The DOH and CDHA should receive a copy of the annual DOM audited financial reports, and make any appropriate determinations relating to financial operations.

Rationale: DOM has an independent audit conducted of its financial records on an annual basis. These reports cover all the elements of DOM operations. Given the size of the AFP contribution to DOM, it would be appropriate that DOH and CDHA be provided with these reports.

6.0 CONCLUSION

As this study has demonstrated, AFPs have emerged across the country as a preferred management and payment system for academic physicians. Most Canadian provinces have introduced some variety of "alternative funding", in an effort to move away from the FFS physician remuneration system and the incentives it promotes. However, the administrative infrastructure to effectively manage, monitor and evaluate AFP performance is still in a state of evolution, as departments of health attempt to design appropriate accountability frameworks and the requisite information systems to capture information relating to AFPs. In this sense, all major participants in the AFPs are developing and building capacity to effectively manage and assess these new operational systems.

Overall, the finding of this audit have brought to light many important benefits provided by the AFP to Nova Scotia's health system. Recruitment and retention of specialists at the Dalhousie Department of Medicine have been shown to have been enhanced, the educational program strengthened, and the delivery of clinical care redesigned to provide for more appropriate, rational, and responsive care from DOM specialists. The AFP is seen to have contributed to greater stability and security of DOM divisions.

Interviews and survey information also brought to light new patterns of clinical practice, which provide for greater collaboration, and the integration of associated health professionals, such as clinical nurse specialists and physician extenders, in the delivery of team based care. These new deployment models deserve close attention and analysis, as clearly alternative payment mechanisms have enabled different configurations of providers to emerge, with important implications for education, training, HHR planning, and health care costs. Policy makers are encouraged to further study these models, and to incorporate findings into decisions.

Furthermore, AFPs have contributed to a more holistic style of practice, related to team-based delivery, where health promotion, disease prevention and screening activities have been emphasized by providers.

However, the audit process has also identified many serious administrative weaknesses both in the development, and in the implementation of the AFP. These include: the negotiation process; communication and inter-relationships among the parties; compliance issues; controls; management and accountability; reporting and shadow billing issues; overpayment based on actual FTEs; duplicate benefits; unclear policies relating to payments to part-time physicians; absence of deliverables; reliable information and/or reporting systems; subsidization of the Dalhousie Medical School through the AFP; overhead allocations; absence of required resources at DOH to effectively manage the AFP; and many others.

Furthermore, there were also concerns from the perspective of those outside of the AFP. Communication, access, and professional relationships were raised as problematic areas, and it

was emphasized that continuity of care between the family doctors and specialists was being compromised under the AFP system.

The frustrations expressed by many primary care providers concerning access and wait time issues, are frequently outside of the control of the DOM. Demand for health care services continues to grow as a function of demographics and increase of chronic condition. However, care must be exercised, in the interests of coordination and integration of services across the various levels of care, that the DOM does not contribute to fragmentation of care and that its objectives and operational standards be clearly communicated system-wide.

To its credit, the DOM has adopted several important initiatives to provide for quality of care, to effectively manage and monitor AFP performance, and to assess DOM productivity. Many of these initiatives were developed unilaterally by DOM in the absence of overall direction and focus provided by DOH or CDHA. The triage system, standards for wait times and productivity, reporting systems, have been important contributions of the DOM to the AFP process and management.

This Report details these findings, and puts forward recommendations to address the design, management and implementation of AFPs. Many remedial measures need to be immediately adopted in the management of this, as well as other AFPs. Some of these measures are proposed below and will require a collegial and concerted effort by the principal stakeholders in the AFP process – DOH, Dalhousie University, DOM, CDHA, MSNS, - to come together so as to make the AFP program and process more transparent and accountable to the public.

7.0 DOCUMENTATION REVIEWED

Auditor General

Health – Physician Alternative Funding Initiatives (pp. 159-171), 2000
Health – Payments to Physicians (pp. 162 – 179), 2003

Grant Thornton

University Internal Medicine Clinic Financial Statements December, 2003
University Internal Medicine Research Foundation Non-consolidated Financial Statements December, 2003
ACADOM Limited Financial Statements Dec 2003

Department of Medicine

Document/Correspondence files
DOM Group Insurance Plan
Department of Medicine Practice Plan Report. Review of Policies and Procedures of the Departmental Practice Plan, 1999.
Department of Medicine Annual Report, 2002/03
- Vol 1. Progress and Profiles
- Vol 2. Compendium of Divisional Activity
- Vol 3. Faculty, Academic and Administrative Monograph
- Vol 4. AFP Indicators and Innovations
- Vol 5. Service to the Community
- Vol 6. Improving Access to Specialists: Department of Medicine Triage Process & Wait Time Standards for Ambulatory Care - 2004

Department of Medicine Dalhousie QEII Health Science Centre Capital District Health Authority Annual Report, 2003-2004
Department of Medicine Queen Elizabeth Health Science Centre Annual Report. January – December, 2001
Department of Medicine Queen Elizabeth Health Science Centre Annual Report. January – December, 2002
Divisional Reports January to March, 2004
Review of MTU Activity July, 2002-March, 2004 QEII Health Sciences Centre
A Value-For-Money Analysis of Department of Health Funding to the Department of Medicine
DOM AFP Proposed System for Filling Vacancies and Approved New Positions
DOM/CDHA/Dalhousie Briefing Document RE: Renewal of Department of Medicine AFP Agreement April 1, 2205.

Execution Copy of Contract with DOM, 2001
Treating Nova Scotia's Tertiary Care Crisis. A Block Funding Proposal for Dalhousie University Department of Medicine (1999 AFP Proposal)
1999 AFP
Building on Success. Proposal for Renewal of Alternative Funding Plan, 2002
DOM AFP Evaluation
DOM Deliverables Under an AFP
DOM/Dalhousie./Capital Health Criteria for Allocation of Clerical Support Staff to Divisions

Nova Scotia Department of Health (DOH)

Correspondence files
Nova Scotia Department of Health Data Catalogue 2nd Edition May, 2002
Nova Scotia Annual Statistical Report Fiscal 2002-2003
Report of the Provincial Wait Time Monitoring Project Steering Committee January, 2004
Implementation Plan of the Nova Scotia Wait Time Monitoring Project Steering Committee May, 2004
Alternatives to Shadow Billing by Keith Jackson , 2004
Principles for Negotiating Alternative Funding Contracts ***Draft***
AFP Negotiating Process (Flowchart)
Annual Accountability Report for the Year 2002-2003
Making Better Health Care Decisions for Nova Scotia. A report by the Clinical Services Steering Committee, 2001
NS DOH 2001 – 2002 Business Plan, 2001
NS DOH 2002-2003 Business Plan , 2002
NS DOH 2003 – 2004 Business Plan , 2003
Good Medicine: Securing Doctors' Services for Nova Scotians, 1997

MSI/ABCC

MSI Procedures Manual Chapter Monitoring and Statistics. Section Medicare Monitoring Procedures.
MSI Medicare Audit Plan. February, 2002

Capital District Health Authority

Operational Measures Indicators Report, 2004
This is Our Life. Community Health Status Report, 2002
Capital Health Contact List for VP, Directors & Managers, July, 2004
ABCC Record of Payments January, 01- December, 03

AFA (Alternative Funding Agreements)

General

1. AFP Deliverables and Accountability Framework, 2001-2006
2. Deliverables of an AFP (pp. 22-26)
3. Principles for Negotiating Alternative Funding Contracts
4. (Ontario) Data Requirements for an AHSC AFP

Other Contracts

1. Copy of Psychiatry contract (not signed but operational)
2. Copy of Pediatric – IWK signed and operational
3. Copy of Surgery contract
4. Copy of Anaesthesia contract

Minutes of Meetings

AFP Governance Committee

CIHI Reports/Website:

Supply, Distribution and Migration of Canadian Physicians, 2003

National Physician Database (NPDB) Physician Services Benefit Rates Report Canada, 2001-2002

Southam Medical Database. Supply, Distribution and Migration of Canadian Physicians, 2003

National Physician Database (NPDB) Physician Services Benefit Rates Report, Canada, 2001-2002

Analytical Bulletin Physician Expenditures

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APPENDIX A KEY RESPONDENT LIST (INTERVIEWS)

Nova Scotia
- Department of Health

Bower, Ian
Breckenridge, Jane
Doiron, Cheryl
Gaulton, Catherine
Jackson, Keith
Joyce, Mike
McFarlane, Ron
Miller, Jim
Penny, Linda
Rafuse, Bryon
Ryan, Brenda
Vaughan, Peter

- Treasury Board

Dunn, Frank
Laflèche, Paul
MacDonald, Margaret

- Public Service Commission

McLean, Gordon

- Auditor General's Office

Morash, Elaine
Spicer, Terry

Capital District Health Authority

Crocker, Cal
Davies, Moira
Ford, Don
Frances, Heather
Harnish, Wanda
Hovey, Natalie

Kazimirski. Judith
MacDonald, Joan
MacNeil, Kathy
Smith, Susan
Sullivan, John

Doctors Nova Scotia

Clarke, Doug
Van Dine, Bob

Atlantic Blue Cross Corporation

Foster, Betty
Rykers, Henny
Sample, Karen
Taylor, Twyla

Grant Thornton

Lacroix, Gerry
Williams, Michele

Dalhousie University
- Faculty of Medicine & Department of Medicine Administration

Boliver, Jane
Burlton, Elizabeth
Cook, Harold
Kidston, Jann
McIntyre, Graham
Nicholson, Brenda
Robertson, Wesley
Spence-Wach, Susan

- Department of Medicine

Anderson, David
Baker, Michelle
Beed, Stephen
Blackmore, Gail
Cowden, Elizabeth Anne
Dorreen, Mark

Gregor, Ron
Hanly, John
Johnston, Lynn
Joyce, Brenda
Kanygin, Bob
Klotz, Jennifer
Leddin, Desmond
Purcell, Angela
MacPherson, Heather
Mallery, Laurie
Mann, Elizabeth
McIntyre, Paul
McIvor, Andrew
O'Neill, Blair
Purdy, Allan
West, Michael
Ur, Ehud

Provincial/Territorial Respondents

Brygityr, Sean - Health Labour Relations Officer, DOH, Manitoba
Fleming, Blair – Department of Health and Community Services, Newfoundland & Labrador
Gartner, Dawn – Insured Health Services, Yukon
Godin, Cyrille - MOH Medicare Services, New Brunswick
Irwin, Joanne - Department of Health and Social Services, Prince Edward Island
Joncas, Philippe - Ministère de la santé et des services sociaux du Québec**,** Québec
Lazaro, Arty –MOH, Ontario
Magnussen, Donna - Medical Compensation Unit, MOH, Saskatchewan
McCoughan, Sharon - Health Workforce Development, Alberta Health and Wellness, Alberta
Stanley, Karen – MOH, Ontario
Taron, Catherine – Physician Compensation, MOH, British Columbia
Urbanski, Lawrence Alberta Health and Wellness, Alberta

APPENDIX B PROPOSED AFP MANAGEMENT ACCOUNTABILITY FRAMEWORK

As underlined by the analysis and findings of the project team, it is essential that AFPs be based on a clear Management Accountability Framework (MAF)which articulates goals, objectives, activities, inputs, outputs and results expected (outcomes) from each AFP. This will ensure that the program is well designed, transparent and amenable to an assessment of its performance and quality. As such, the Management Accountability Framework must include specific and quantifiable performance measures or indicators, which will test for and assess the achievement of results at all major stages of the program.

The Federal Government's Treasury Board Secretariat has developed a **Management Accountability Framework**, which is based on the **Results for Canadians** policy. The MAF has been part of public sector reforms which have emphasized more results-oriented and accountable style of public management, and is utilized by close to 100 agencies and departments across the country. The MAF provides an overarching approach to program design and operations, which encourages government departments and agencies to focus on management results and to develop the capacity to measure progress. The MAF model provides a basis for enhanced organizational performance of public programs and services, and can serve as a valuable guide for how to develop, manage, and evaluate AFPs.

> "All government decisions must be framed by enduring public service values and the capacity to grow, learn, and innovate. Excellence starts by having management frameworks that are effective and performance information that is useful."
>
> [www.tbs-sct.gc.ca/eval/tools_outils/RBM_GAR]

The philosophy put forward in the MAF is based on the following principles, which have application for all publicly funded programs and services:

- thinking about citizens first;
- applying a rigorous policy analysis;
- considering key risks;
- using the right work force;
- ensuring that public resources are managed with probity; and ,
- assigning clear accountabilities, with due regard to capability.

Focus on Results

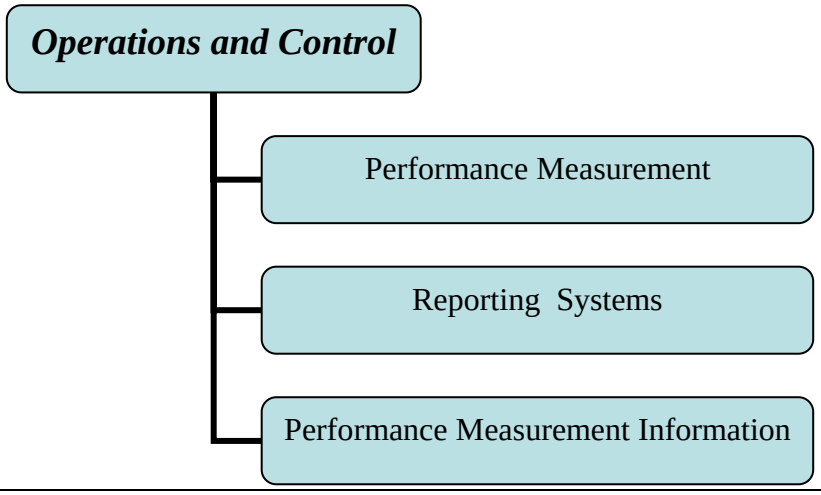
As new funding mechanism, AFPs would benefit from a clear definition of what results are to be obtained and what outcomes they are to deliver in exchange for the considerable public funds expended. The prime benefit of the MAF is its focus on results; as such, it is a tool to promote:

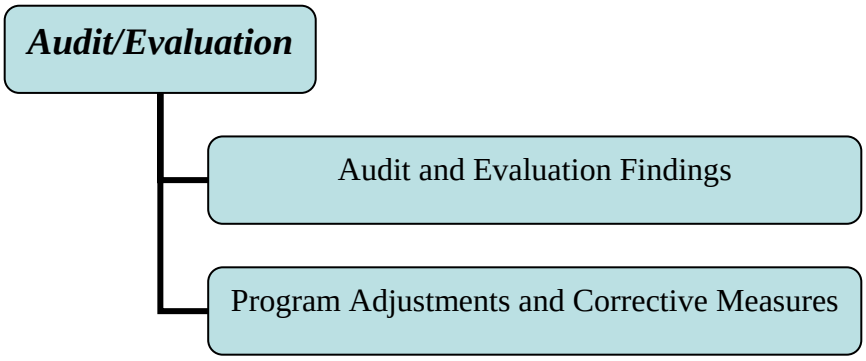
- services focused on citizens;
- public service values (e.g. democratic, professional, ethical, and citizen-centered values);
- strategic direction translated into measurable results, achieved through optimal organizational performance;
- transparent and accountable decision making;
- valuing human resources, and ensuring that human and intellectual capacities are developed;
- responsible spending, with sound stewardship of public resources;
- the identification of risks and their corporate management; and,
- ensuring that organizational performance is continually enhanced through innovation, transformation, and learning.

It is important to demonstrate results in all public programs, for reasons of accountability to the public, to funders, to service users and to program managers. This provides for a climate of continuous organizational learning and improvement, and better informs future decision-making and resource allocation decisions.

An effective management accountability framework for AFPs would involve the following broad steps: Planning – Operations and Control –Audit/Evaluation.


Planning
Strategic Goals and Objectives
Results Based Management Framework
Operational Plan
Resource Allocation Plan
Performance Targets
Performance Measurement Indicators
Supporting Information Systems
Financial and Administrative Controls


Operations and Control
Performance Measurement
Reporting Systems
Performance Measurement Information



1. Statement of Strategic Goals and Objectives

Clear policy objectives must be the foundation for all programs; this requires a statement of what the overall purpose of the AFP is and what specifically it is to achieve. AFPs have developed in Nova Scotia largely in the absence of a clear sense of strategic direction or vision. They have been adopted on a reactive basis, or when there is a "crisis" situation. This precludes their optimal design managed growth, with clear objectives and expectations understood by all parties. A coherent overarching framework for AFPs by DOH would provide for direction and focus for the management of AFPs, and promote a common understanding by all stakeholders of desired outcomes. This framework would also provide guidance in terms of resource allocation decisions; currently, the rationale for AFP budgets is based on the previous funding envelope, without reference to whether services are efficient, effective, or appropriate.

These AFP objectives must been aligned with broader DOH goals and directions, together with a statement of how the AFP supports these broader goals and strategic priorities, and will assist in their achievement. There should also be clear differentiation among the different types of alternative funding initiatives utilized by DOH (e.g. rural AFIs would have the objective of providing stable and accessible health care; while academic AFP would have the objective of supporting academic activities in addition to clinical services, and recruiting and retaining university-based medical specialists in the province).

Program objectives would also need to take into account the goals of the CDHA, and be integrated with these district-wide strategic directions; as such, AFP objectives would benefit from being developed in partnership with regional health authorities.

2. Results Based Management Framework

Results Based Management (RBM) is a management approach which emphasizes results in planning, implementation, corporate learning and reporting. Participation and stakeholder involvement are key components of RBM, which contribute to improving the quality, effectiveness and sustainability of programs.

RBM involves the following dimensions:

1. defining realistic results based on appropriate analysis;
2. clearly identifying program beneficiaries and designing programs which meet their needs and priorities;
3. using results information to make effective and on-going management decisions;
4. monitoring progress of expected results and resources spent with the use of relevant indicators;
5. increasing knowledge and improving practice through lessons learned;
6. clearly identifying management risks and developing measures to address them; and
7. reporting results and resources utilized.

Results are measurable changes resulting from a cause and effect relationship, which can be described in short terms indicators or outputs; medium term indicators or outcomes, and longer-term indicators or impacts. Intended results are the desired outcomes associated with meeting the goals and objectives for the program.

In essence, an RBM framework is a logic model, which coherently establishes program activities, reach, time frame, risks, outputs, outcomes and results expected. A model RBM framework is provided in Table B-1 below,

Table B-1Results Based Management Framework Model

Activity (actions undertaken within the scope of the program)	**Outputs or Short Term Results** (short term effects of completed activities)	**Outcomes or Medium Term Results**	**Impact or Long Term Results**
Beneficiary/ Reach (all individuals or groups benefiting from the program directly or indirectly)			
Indicative Time Frame			
Level of Risk in Achieving Results			

3. Operational Plan

Operational plans translate departmental objectives into strategic activities. Operational or business plans describe how the department intends to achieve these objectives, and includes the purpose of the program or activity, issue analysis, strategies, performance targets and measurement indicators, as well as resources required to carry out these activities. AFPs should be included in the DOH business plans and there should be a description of how these are to be "operationalised". Likewise, the AFP should include its own operational plan over the term of the contract, with a resource allocation and activity plan.

Clear operational policies must be developed for AFPs, to allow for a rational understanding of how the programs operate, what are the policies, rules and procedures. Standardized policies and procedures would allow for transparency, equity, clear expectations, as well as standardization and consistency of operations. An operation manual would assemble all policies, procedures, rules and regulations into one document; this manual could be placed on the DOH website for all stakeholders to consult.

The terms and conditions for different AFPs have been very varied, with different and inconsistent contract arrangements, funding formulas, compliance requirements, accountabilities, billing practices, service deliverables, and reporting requirements. The development of clear and standardized policies and procedures are a prerequisite for a sound understanding of program operations and for optimal performance. Clear reporting standards must be developed and communicated to all parties.

4. Resource allocation plan (multi year budget)

The development of a funding plan, which will detail what expenditures are to be made during the life of the contract, is required. Financial forecasting and expenditure reporting represent two of the most essential elements of program accountability. Operational planning must be accompanied by a functional business plan, thoroughly tested and designed in a fashion that allows cost allocation along program lines. This latter aspect is particularly necessary at the initial stages of introducing performance measurements as it adds an additional element in validating program cost projections and development of operational budgets. In order for the business plan to have any real value, systems must be in place to capture costs, apply the appropriate allocations and also provide variance analysis.

5. Performance Management

There needs to be a common understanding of what the AFP is established to accomplish, and the capacity to analyse what it has achieved. It is essential for program managers to be able to

assess whether or not the resources expended are achieving the expected results and value for money obtained. No formal performance measurements have been designed to provide a clear indication of results obtained for current AFPs. Information and financial systems, controls and monitoring have been weak. AFPs and AFIs have been operating in Nova Scotia since 1994, without adequate information as to how these programs are working, or how effective or efficient they are. Accordingly, health managers cannot demonstrate to the public that these funding mechanisms provide better value for money than traditional FFS systems. This deficiency needs to be immediately addressed.

Performance management is an essential program management component. Performance measurement provides key information to decision-makers and stakeholders which can improve program performance and ultimately, the results obtained. It also contributes to sound resource allocation decisions and can assist in mitigating risks.

A performance measurement framework is a key ingredient in measuring results. Indicators are measurement gauges which determine whether results are being achieved. Baseline data provides a foundation against which to measure changes. Steps to developing mutually agreed upon performance measures include agreement upon a common set of principles; development of a framework for types of measurements; selecting methods based on quality and reliability of performance data; and agreeing upon reporting systems and timetables.

An accountability framework requires the development of outcomes-based performance measures. The FFS system is founded upon an activity-based framework, whereas AFPs should be more focused on results and outcomes. An AFP accountability framework must demonstrate how it has contributed to the improvement of population health and providing quality services to citizens. The audit team recognizes that AFPs are complex, because of the nature of the services themselves, as well as because of the multiple roles and responsibilities of the contracting agency, the DOM. Demonstrating accountability will require a concerted effort and discipline by all parties involved, and should be undertaken immediately.

It is important for all participants to come together to meet common objectives in a process which recognizes the value of diverse perspectives and contributions. An example of a performance measurement framework is provided in Table B-2 (below)

Table B-2 Performance Measurement Framework Model

Results	Performance Indicator	Data Source(s)	Data Collection Methods	Frequency	Responsibility
Activity					
Output					
Outcome					
Impact					

6. Performance Indicators

An indicator is a tool for measuring results, to demonstrate that progress has been achieved (or not), and to show that a result has been produced. Indicators measure actual results obtained, as against planned or expected results, and can been expressed in terms of quality, quantity, cost and/or timelines.

The development of performance indicators must determine what type of information is required, and how that information will be utilized to make managerial decisions.

Performance measurement indicators can include:

- Service levels and access;
- Service quality;
- Appropriateness of provider and type of service;
- Patient outcomes;
- Patient satisfaction; and,
- Efficiency and productivity (# of patients/period of time).

There has been much work, both in Canada and in other jurisdictions, in the development of health system performance indicator. [see also www.cihi.ca]

7. Performance Measurement

The weaknesses of the required AFP information systems have been discussed in this report and recommendations presented. These are critical for effective performance measurement. A performance measurement strategy should:

- identify appropriate monitoring approach and review tools;
- use common databases where possible and share information;
- factor-in performance and contextual information from external sources, e.g., societal indicators for broader context;
- invest in necessary information management/information technology systems;
- include a set of indicators for short-, medium- and long-term;
- identify indicators to measure progress on objectives and results ("indicators" means what measurement tool will be used to demonstrate performance);
- develop comparative and societal indicators where possible;
- outline dispute resolution and appeals/complaints practices; and,
- establish an approach to corrective action if partners' responsibilities are not fulfilled or when adjustments are needed to address citizens' complaints.

8. Reporting Requirements and Systems

AFPs should include clear indication of reporting requirements and responsibilities. Reporting on results should be differentiated from reporting on activities, and should describe where the program is, in relation to where it was expected to be. Reporting also provides for clear communication to stakeholders as to AFP performance and productivity.

Provisions for effective reporting require:

- identify and communicate the reporting strategy early in the initiative;
- consider incorporating performance information into existing reports; and,
- report publicly on citizens' appeals and complaints, and ensure confidentiality and privacy needs are met.

Performance reporting that is transparent, open, credible and timely should:

- use all forms of performance evidence to support reporting;
- provide easy public access to information;
- link costs to results where possible;
- use independent assessments;
- track lessons learned and good practices and communicate these; and,
- establish mechanisms for improvements and innovations.

Because of resource constraints, DOH has spent little time on contract monitoring. As a result, significant accountability concerns have arisen, which are highlighted in this report. These include: non-compliance with terms of the AFP contract, inappropriate funding, inadequate reporting and record keeping (FTE, and others).

9. Audit/Evaluation

Finally, AFPs require the design of a sound audit and evaluation framework, which establishes the criteria upon which its performance will be analysed and assessed.

As relatively new program and funding models which provide for "envelope funding", AFPs must be regularly evaluated in relation to their process (management) and impact (results), and the lessons learned integrated with organizational learning and growth.

In light of the resources expended, AFPs should also be regularly audited to ensure economy, efficiency, effectiveness and value for money.

Clinical impacts as well as academic impacts, will need to be closely monitored, in an attempt to understand the effect of AFPs on services provided, taking into account shifting demographics, population health, acuity levels and evolving patterns of care.

Identifying Results for AFP

To summarize, a new approach for AFPs is required, which focuses on results to be achieved. A process for this approach would include:

- Setting clear goals, objectives, strategic priorities and a statement of key results expected;
- involving stakeholders and service recipients in defining key results, clearly describing results expected and showing links to provincial health objectives;
- communicating expected results, and service level commitments to all stakeholders;
- focusing on outcomes (as opposed to inputs, process, activities or outputs);
- assigning roles and responsibilities;
- defining what each party is expected to contribute to achieve the outcomes;
- communicating and explaining the role and contribution of each partner; and,
- clearly link performance expectations to the capacities (authorities, skills, knowledge and resources) of each partner to ensure that expectations are realistic.

APPENDIX C DETAILED SURVEY ANALYSIS

APPENDIX C-1 DALHOUSIE DOM FULL TIME AND COMMUNITY BASED PHYSICIANS

Questionnaires were sent to all members of all Divisions of the Department of Medicine. In two instances an individual was cross listed in two Divisions and there were a number of cases where an individual had either just recently left the Department, just recently joined the Department, was on sabbatical or on leave. A total of 166 individuals were screened to fit the criteria for this survey and of those, 142 (85%) returned the questionnaire. 56% of respondents joined the Department before 1999 and have experienced both a before (pre) and after (post) AFP payment scheme. 44% were hired in 1999 or later, and have only worked for the DOM under an AFP arrangement. However, a number of these respondents did point out that they had worked under a FFS system in another jurisdiction and answered the questions based on this experience; thus, it is not unusual to have fewer than 44% of the respondents choose the "not applicable" option for questions that ask for a comparison of AFP to FFS experience. On average, 84% of the Department are full-time and 16% are community-based.

The questions in which the respondent was asked to choose a specific answer are summarized below and as an interdepartmental comparison in Table D-1. For a synopsis of answers to questions where the respondent was asked to comment or expand upon an issue, see the following subsections which analyse the survey at the Divisional level.

All members of the Department of Medicine undertake clinical services and teach, while approximately 80% engage in research and administrative functions. There is, however, notable less research done by members of the Divisions of Dermatology and, to some extent, Physical Medicine and Rehabilitation. In six divisions all members are active in research endeavours. Telephone consultations are done by just over half of the Department members, with only 13% and 10% doing telehealth or e-mail consultations, respectively. 17% engage in community outreach services.

Almost half of the respondents noted that they were able to undertake all of the activities they identified before the AFP and 17% were not. 37% of respondents chose "not applicable" which is at least what would be expected considering the size of the post-AFP group is 44%. One quarter of the respondents felt that there has been no change in their capacity to engage in the activities they are involved in; however almost as many (24%) noted a "moderate increase", and 21% a "significant increase". Only a few respondents reported a decrease.

Three times as many respondents have found there have been benefits working under an AFP as not. The areas that have particularly benefited included primarily clinical services (identified by 62 or 44% of the respondents), teaching (37%), administration (33%) and research (31%) in that order. To a lesser extent, telephone consultation (15%), community outreach services (7%) and telehealth (6%) activities were thought to have benefited under the AFP. Just over half of the

respondents (51%) feel that there have been drawbacks working under an AFP; however, the majority (88%) do not think that the FFS payment system should be reinstated.

The majority of the respondents felt that the AFP has had a "beneficial impact" on the delivery of clinical services in their Division. Only 7% thought that the AFP has had a "negative impact" on the delivery of clinical services, and a similar number of respondents felt that the volume of services has decreased. Of the respondents who found the question regarding changes in the volume of services applicable to their personal experience, the majority noted an increase (40% a "moderate increase" and 21% a "significantly increase"). Slightly fewer (28%) felt that there has been "no change". On the other hand, of that same group, 53% felt that their time available for patient consultation had not changed, with 24% and 8% noting a "moderate" or "significant increase" respectively. A number of respondents found that their time available for patient consultation had decreased. 7% cite a "moderate decrease" but 2% have found a "significant decrease" in their time available for patients.

Of the 89 respondents who found the question asking how their methods of practice has changed applicable to their situation, almost half (43) identified using expanded practice nurses as a change. Other changes reported, in order of applicability, included: spending more time in clinical teaching (38), spending more time with patients (37), using physician extenders (30), seeing more acute patients (28) and engaging in more disease prevention and health promotion activities (21).

The utilization of in-patient facilities, out-patient care or use of diagnostic testing was thought not to be affected by the AFP for 49% of respondents. However, only 20% indicated that it was (31% chose "not applicable"). Most respondents felt that their working relationship with primary care providers has not changed during the AFP. But, almost 20% have noted a change.

Of the respondents who found the question of whether or not the AFP promoted a more integrated approach to clinical service delivery, slightly more (58%) thought it did than not (42%). Patient access to care was thought to have improved by almost half of the respondents who found this question applicable to their situation. 31% felt it had improved "moderately" and 18% thought that there has been a "significant improvement". However, 44% felt that there has been no appreciable change and 6% noted that it has become worse.

The overwhelming majority of respondents (93%) believe that the triage system in place is effective, 88% think that wait time/wait list information has been effectively utilized to manage patient access to care.

The quality of clinical services has been described as "excellent" by almost half of the respondents (49%) with 38% rating it as "very good". Eight percent find the quality of service "good" with only 4% and 1% finding it "fair" and "poor" respectively.

Table D-1 Interdepartmental Comparison of Responses

	DOM	Card	Derm	Endo	GI	Gen Med	Geri	Haem	Inf. Dis.	Onc	Neph	Neuro	Pall	PM&R	Resp	Rheu	CC
Proportion (%) of Department/Division members who are full time verses community-based																	
Full Time	84	87	27	88	90	90	100	100	100	89	100	77	100	83	100	50	100
Community Based	16	13	73	12	10	10				11		23		17		50	
Proportion (%) of Department/Division members who joined the DOM before 1999 verses 1999 or later																	
Pre-AFP	61	52	73	50	60	55	75	100	75	33	40	77	50	66	100	67	86
Post-AFP	39	48	27	50	40	45	25		25	67	60	23	50	33		33	14
Percentage of each respondent group who identified the following areas of activity that they are currently engaged in																	
Clinical	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100	100
Teaching	100	100	100	87	100	100	100	100	100	100	100	100	100	100	100	100	100
Research	78	83	18	100	90	63	88	100	100	100	80	85	100	50	100	67	71
Admin	80	78	63	87	90	63	100	100	75	89	100	69	75	67	100	67	86
Telehealth	13	9	27	12	10		25	17		22	10		40	67			
Telephone	51	43		75	50	63	63	83	75	44	70	31	60	67	100	50	14
E-mail	10	4	9	38		9	13	17		22		15		17	25	17	
Outreach	17	4		24	20	9	63	17		44	20		60			17	14
Percentage of respondents who felt they were able to undertake the activities they identified before the AFP																	
Yes	49	52	80	38	70	45	25	33	75	33	40	46	20	33	75	50	57
No	17	4	10	25	10	10	25	50			10	31	40	17	25	33	29
N/A	34	43	10	38	20	45	50	17	25	67	50	23	40	50		17	14

	DOM	Card	Derm	Endo	GI	Gen Med	Geri	Haem	Inf. Dis.	Onc	Neph	Neuro	Pall	PM&R	Resp	Rheu	CC
Percentage of respondents who assessed their capacity to engage in these activities as:																	
Significantly increased	21	17	18	80	10	27	29	33	25		20	15	20	33	50	33	43
Moderately increased	24	22	18	50	20	9	29	17			40	31	20	33	25	33	29
No change	25	22	55		40	27		33	50	11	10	38	20		25	33	29
Moderately decreased	3				10		14			22							
Significantly decreased	1													17			
N/A	26	39	9	38	20	36	29	17	25	67	30	15	40	17			
Percentage of respondents who felt there have been benefits or not in terms of activities working under an AFP																	
Benefits	61	57	55	75	50	56	88	83	50		80	54	80	50	80		86
No benefits	18	9	45		30			17	25	33		31	20	17	20	33	14
N/A	21	35		25	20	44	12		25	67	20	15		33		67	
Percentage of each respondent group who identified the following areas of activity that have benefited under the AFP																	
Clinical	44	26	45	63	30	36	75	83	25		60	38	60	50	60	50	57
Teaching	37	26	55	38	10	36	50	67	25	11	60	31	80	33	40	67	29
Research	31	30	9	38	30	18	38	50	25	11	50	31	80	33	20	50	
Admin	33	30	27	50	10	27	38	33		11	60	31	60	33	60	50	29
Telehealth	6		9				13					8		33	20		14
Telephone	15	12		25	30	9		17	25		20	8	40		60	17	14
E-mail	<1															17	
Outreach	7	17			20	9	25				20		60				
Other								33									

	DOM	Card	Derm	Endo	GI	Gen Med	Geri	Haem	Inf. Dis.	Onc	Neph	Neuro	Pall	PM&R	Resp	Rheu	CC
Percentage of respondent group who felt there have been drawbacks or not working under an AFP																	
Drawbacks	51	68	30	50	87	22	38	50		89	60	15	60	33	60	50	70
No drawbacks	49	32	70		13	78	62	50	100	11	40	85	20	67	40	50	30
Percentage of respondents who thought the FFS payment system should be re introduced or not																	
Reintroduce FFS	12	24	22	29	33	10					10			33			
Do not reintroduce	88	76	78	71	66	90	100	100	100	100	90	100	100	67	100	100	100
Percentage of respondents who felt the AFP had a beneficial or negative impact on the delivery of clinical services																	
Beneficial	68	45	56	88	55	90	100	100	100	22	70	85	60	50	100	67	71
Negative	7	10	11		33					11				17			14
N/A	25	45	33	12	11	10				67	30	15	40	33		33	14
Percentage of respondents who assessed the volume of clinical services to have:																	
Significantly increased	15	22		24		20		17		22		15	20		60	17	29
Moderately increased	28	17	9	38	50	10	50	50	25	11	30	38	40	17	40	50	14
No change	20	17	55		20	20	12	17	50			23		50		17	43
Moderately decreased	6	4	27								20	8					14
Significantly decreased		39															
N/A	31		9	38	30	50	38	17	25	67	50	15	40	33		17	

	DOM	Card	Derm	Endo	GI	Gen Med	Geri	Haem	Inf. Dis.	Onc	Neph	Neuro	Pall	PM&R	Resp	Rheu	CC
Percentage of respondents who have assessed their time available for patient consultation to have:																	
Significantly increased	6	4	9	20		10						15	20	17	20		14
Moderately increased	17	13	9		10	20	25	67			10	23	40	33	40	17	
No change	37	30	73	38	40	20	38		75	29	30	46		33	20	67	43
Moderately decreased	5	9			20					14	10				20		
Significantly decreased	2			20	10												
N/A	32	43	9	38	20	50	38	33	25	57	50	15	40	17		17	43
Percentage of respondents who have noted their method of practice has changed as follows:																	
Seeing more acute pts	20	9		50	30	18		67	50		10	23	20		40	33	29
Spending more time with pts	26	22	27		30	27	25	33	25	22	10	38	60	50	20	17	29
Using phys. Extenders	21	17	9	38	30	18	25	67			10	23	40	17	60		14
Using EPN	30	22		50	50	27	38	50	25		50	46	40	33	60		14
More disease prevention	15	26	9	25	10		13	17				15	20	50	40		14
More time teaching	27	13	27	13	30	27	25			11	20	31	100	67	40	50	29
Other	19	17	18	13	40	9		17		33	10	8	20	50	20	17	29
N/A	37	48	45	25	20	54	38	17	50	56	50	38		17	20	17	43

	DOM	Card	Derm	Endo	GI	Gen Med	Geri	Haem	Inf. Dis.	Onc	Neph	Neuro	Pall	PM&R	Resp	Rheu	CC
Percentage of respondents who the AFP affected utilization of in-patient facilities, out-patient care or use of diagnostic testing																	
Yes	20	33	10	50	20	9		50			20	15		17	60	40	14
No	49	29	50	25	60	55	75	17	75	33	40	62	100	50	40	40	71
N/A	31	38	40	25	20	36	25	33	25	67	40	23		33		20	14
Percentage of respondents who have noticed a change in their working relationship with primary care providers since the AFP																	
Yes	19	5		62	50	9		33		11		31	60	17	60	17	
No	54	59	82	12	30	55	75	33	75	44	60	46	20	67	40	67	86
N/A	27	36	18	25	20	36	25	33	25	44	40	23	20	17		17	14
Percentage of respondents who felt the AFP has promoted a more integrated approach among the clinical service delivery providers																	
Yes	41	32	20	38	33	60	63	67	25		33	23	60	50	80	50	14
No	30	23	70	25	50	10	12	17	25	33	33	15	20	50	20	33	57
N/A	29	45	10	38	22	30	25	17	50	67	33	62	20			17	29
Percentage of respondents who assessed changes to access to care under the AFP as:																	
Significantly increased	14			12	10		25	33			22	25	20	17	60	40	14
Moderately increased	24	26	27	50	10	27		50			11	33	60	33	40	20	
No change	34	26	55	12	30	36	50		75	50	44	25	20	50		20	57
Moderately decreased	2	9								12							
Significantly decreased	2		9		20												
N/A	23	39	9	25	20	36	25	17	25	38	22	17				20	29

	DOM	Card	Derm	Endo	GI	Gen Med	Geri	Haem	Inf. Dis.	Onc	Neph	Neuro	Pall	PM&R	Resp	Rheu	CC
Percentage of respondents who felt the triage system in place is effective																	
Yes	93	100	100	88	70	91	100	100	100	62	100	100	100	83	100	100	100
No	7			12	30	9				38				17			
Percentage of respondents who felt the wait time/wait list information has been utilized to manage patient access																	
Yes	88	100	75	100	70	73	100	100	50	67	100	100	80	83	100	100	50
No	12		25		30	27			50	33			20	17			50
Percentage of respondents who describe the quality of clinical services offered in their division as:																	
Excellent	49	41	50	12	10	70	75	67	100	22	78	67	60	50	40	67	14
Very good	38	45	40	50	40	30	25	33		44	22	25	40	33	60	33	71
Good	8	9	10	25	10					33		8					14
Fair	4	5		12	30									17			
poor	1				10												

C-1.1 Cardiology

Thirty questionnaires were sent to this Division and 23, or 77% were returned. Of this group, 12 joined DOM prior to 1999 and could offer a pre- and post-AFP perspective. Eleven have joined DOM since the AFP was implemented. The majority of this respondent group (87%) are full-time members of the Department. Three (or 13%) are community-based.

All respondents reported that they engaged in clinical services and teaching activity, and 83% also stated that they engaged in research activities, 78% in additional administration activities and 43% in telephone consultations. Only two respondents claimed to use telehealth and one identified community outreach, email consultations. Other areas of activity which were reported by some/several respondents included membership in professional organizations, and associated meetings; national patient care advocacy initiatives, membership on editorial boards; and membership on national and international organizations.

Eleven of the respondents who were part of the DOM prior to the AFP being implemented stated that they were able to undertake all of these activities before the AFP. Of the 12 pre-AFP group of respondents, two or 33% noted a "significant increase" in their capacity to engage in all of the identified activities under the AFP. Four or 31% noted a "moderate increase" and five noted "no change".

75% of the pre-AFP group reported benefits in terms of working under an AFP, with two or 17% noting no benefits and one selecting "not applicable".

The following areas of activity were cited as having particularly benefited under the AFP: Administration; research; teaching; clinical services; telephone consultations; and community outreach, in that order.

The strengths of the AFP programme were described as follows:

In general, the AFP has permitted DOM members to focus more on clinical care, without regard to remuneration; to undertake "more appropriate clinical care…not concerned with remuneration per item"; not being driven "by volume"; being able "to provide quality care versus volume"; to undertake required clinical assessment without regard to time or volume. At the same time, AFP has enabled a "critical assessment of utilization…and reduce inappropriate utilization".

In terms of clinical practice, the AFP has promoted a more "collegial practice style", more interaction with other specialists. It has enabled physicians in the Department to "delegate routine aspects of clinical care" and thus focus on more appropriate services.

The AFP has also allowed members to undertake other activities not covered under FFS, such as program development and education; research, and other non-clinical activities.

Teaching, research and program administration were reported as having particularly benefited under the AFP and have helped to "put Dalhousie on the map".

The AFP has assisted with recruitment of faculty with strong academic backgrounds.

When asked if there were drawback associated with working under an AFP, most respondents (68%) answered yes. It should be noted that most of the respondent group who joined the Division post-AFP chose to respond to this question. The following observations were offered:

- Workload imbalances among members of the division with some members doing more than others, with no financial compensation;
- The "defensive atmosphere" provoked by AFPs;
- The difficulty of "capturing academic activities" for reporting purposes;
- No clearly defined deliverables;
- Providing division chiefs with too much discretionary power; "lack of control over process";
- One respondent cited the "reduced pressure to see patients and increase the number of procedures" as a drawback of the AFP;
- No cost of living adjustments or national income benchmarks; "a significant reduction in salary";
- Some respondents cited longer working hours with no compensation under the AFP;
- "Deteriorating clinical services, particularly in providing services to family physicians and their patients"; and,
- Several respondents cited the need for more administrative and clinical support, such as specialty nurse practitioners, to increase productivity.

Only 24% of respondents believed that the FFS system should be reintroduced for the DOM. And close to half of the respondents stated that the AFP had had a beneficial impact on the delivery of clinical services in their division (with 45% responding "not applicable"). Comments offered included: lack of motivation to do clinical work; that the AFP required adequate support in terms of space, booking/registration/secretarial staff and support, along with diagnostic technicians and equipment availability. One respondent claimed that under the AFP "inpatient tertiary care was very good, [however] outpatient access was sub-optimal". "Although this is a survey of tertiary care, specialists in the AFP are major providers of secondary care…issues with hiring in the Division have disadvantaged outpatient services." Deliverables needed to be clearer. One respondent had difficulty with the specialization or "consolidation of everything at the QEII being detrimental…." It was said that FFS community based specialists were needed to help with access issues.

58% of the respondent group who joined the DOM before the AFP was implemented claimed that the volume of clinical services increased moderately to significantly under the AFP, as compared with work under the FFS system. 25% cited "no change", with only one claming that

the volume of services has "decreased moderately". It should be noted that 8 of the 10 respondents who joined the DOM post-AFP group stated "not applicable".

Half of the respondent group who joined the DOM before the AFP was implemented claimed that their time available for patient consultation had not changed with the introduction of the AFP; 25% noted a "moderate" or "significant increase", and 16% noted a "moderate decrease". One respondent chose "not applicable" along with the respondents who joined the DOM after the AFP was implemented.

Most respondents claimed that their method of practice had changed under the AFP and cited: that they were engaging in more disease prevention and health promotion activities; spending more time with patients; using physician extenders and expanded practice nurses; and spending more time engaged in clinical teaching, program development, research, and telehealth.

Of those who have been with the DOM since 1999 or before, these were fairly evenly divided on whether or not the AFP had affected utilization of in-patient facilities, out-patient care and use of diagnostic testing. Comments offered included: undertaking less diagnostic testing (e.g. Holter/stress/echo/ECG); bringing fewer patients back for routine follow-ups; more rational targets for diagnostic testing set in discussion with referring physicians (some increase in cath lab utilization to achieve catch and PCI ttargets/100,000 population); one referred to the deterioration of the clinical infrastructure as a result of increased number of staff hired; another referred to being "completely limited by hospital based resource limitation…e.g. echos, as more machines and sonographers (are needed)".

All but one of the respondents who joined the DOM prior to the AFP being adopted claimed that their working relationship with primary care providers had not changed during the AFP. Comments offered included that they had to redirect out patient consults to other division members; that referrals ought to be handled through a District Cardiac Program, as opposed to the DOM –"a District Cardiac Program management model would be the best way to do a balanced workforce plan". One claimed to have little contact with family physicians.

The group of respondents who have been with the DOM since before1999, were fairly evenly divided (6 versus 5) on whether or not the AFP had promoted a more integrated approach among the clinical service delivery providers. Examples included better service coverage; better testing services; a focus on necessary services versus remunerated services. One respondent observed that "AFPs do not include remuneration of non-physicians and is department-based, rather than clinical program based, which would facilitate this type of evolution of care."

Five of the 12 respondents who have been with the DOM prior to the AFP being implemented felt that the AFP had had "no change" in patients' access to care in their division. Four felt that access had "moderately improved" while two noted a "moderate decrease" in patient access to care.

All respondents reported that the triage system in place in their division was effective and all respondents stated that wait time/wait list information had been utilized to manage patient access.

The quality of clinical services offered in their division was rated very highly by respondents, with most respondents describing them as "excellent" or "very good".

C-1.2 Dermatology

Eleven of the 14 members (89%) of the Division of Dermatology responded to the questionnaire. Of those who responded, 73% joined DOM before the AFP was implemented in 1999, and could offer a pre and post AFP perspective while three have joined the DOM since the implementation of the AFP. It should be noted that one of the respondents who has recently joined the DOM had worked under FFS in another jurisdiction and answered the questions based on that experience. 73% are community based.

All respondents reported that they engaged in clinical services and teaching activities, and 64% also stated that they engaged in administrative and national committee activities. Only two (18 %) claimed to undertake research and telephone consultations, with three partaking in telehealth and one individual in community outreach services. Other areas of activity which were reported by some/several respondents included: membership in professional organization and on call duty.

Seven of the eight respondents who were part of the DOM prior to the AFP stated that they were able to undertake all of these activities before the AFP (the other did not answer this question).

Most respondents (55%) cited "no change" in their capacity to engage in all these areas of activities under an AFP, as compared with 18 % each who claimed a "moderate" or "significant increase". The respondent who recently became a member of the Department post AFP noted that the question was "not applicable".

55% reported benefits in terms of working under an AFP (which includes the three recent members of the division). 45% report "no benefit".

The following areas of activity were cited as having particularly benefited under the AFP: teaching and clinical services, followed by administration, research and telehealth.

Three of the respondents noted no difference or "no change" in terms of services provided. The strengths of the AFP programme included more time for teaching and enhanced recruitment (including a "world class researcher"). Also noted was the latitude to provide necessary medical services that are "not financially feasible due to disproportionate time requirements". One

respondent claimed that "the department as a whole would cease to function if the AFP was lost".

Most respondents (70%) observed no drawbacks associated with working under an AFP. Of those who did observe drawbacks, these noted: "loss of autonomy of individual practitioners"; "make less money and patients get 'off loaded' to specialists outside the AFP if no full time physician in the AFP is available". One of the respondents that observed no drawbacks did however note that the amount of work done by physicians in the AFP is under represented due to inadequate reporting of billing. A respondent that chose not to answer the question directly did note that "it (the AFP) has slowed productivity of FT practitioners and decreased access to services".

Only 22% of respondents believed that the FFS system should be reintroduced for the DOM and just over half of the respondents (56%) stated that the AFP had had a beneficial impact on the delivery of clinical services in their division (with 33% responding "not applicable"). The one respondent who noted a negative impact reported that full-time AFPs see fewer patients. One community-based respondent who did not answer this question directly later noted that they would like to see "an audit of services provided, before and after the AFP, showing patients seen and research done etc." Several respondents noted no effect or no significant change.

Most (55%) of respondents observed "no change" in the volume of clinical services under the AFP compared to FFS, with only one noting a "moderate increase" and three claiming that the volume of services has "decreased moderately". One (post AFP respondent) noted the question as not being applicable. Conversely, 73% claimed that their time available for patient consultation had not changed before and after the introduction of the AFP, two noting an increase (one moderately and one significantly). One respondent noted with respect to this question that the "Royal College felt too many patients were being seen in clinics to give adequate teaching to students ..[so].. the numbers were deliberately cut down."

Most respondents claimed that their method of practice had not changed under the AFP, with only three noting spending more time with patients and spending more time engaged in clinical teaching. Using physician extenders and engaging in more disease prevention was noted by one respondent, respectively. Other changes in methods of practice that were noted included using nurses to run phototherapy treatment units more independently, as well as using physiotherapists to run the same, monitored by telemedicine.

While 40% chose "not applicable", 50% claimed that the AFP had not affected utilization of in-patient facilities, out-patient care or use of diagnostic testing (one respondent claimed it had). Comments offered included: [the AFP offered] the potential for reduction of unnecessary visits; and [the AFP had] decreased efficiency of patient servicing.

82%, or 9 of the 11 respondents, claimed that their working relationship with primary care providers had not changed during the AFP, with the balance choosing "not applicable". One

those who claimed it had not changed commented that several primary care physicians have related that it is more difficult to access physicians in the AFP since its inception.

The majority of respondents (70%) believed that the AFP had not promoted a more integrated approach among the clinical service delivery providers. It was noted that "some services under the AFP are less available……and support for research has declined or even [been] discouraged." One of the respondents who had noted a more integrated approach cited the area of telemedicine and the linking with "about 4000 patients per year" at a regional hospital.

Most respondents (55%) noted "no change" with respect to their belief that the AFP had improved patients' access to care in their division, with a "moderate improvement" noted by 27% of respondents, and one noting a "significant decrease" in access to care. The improvement to access was in direct reference to telemedicine.

All respondents who answered this question (8) reported that the triage system in place in their division was effective. Similarly, they all stated that wait time/wait list information had been utilized to manage patient access; however, one respondent noted that "wait lists are not relevant as we need to know what is happening to physician resources in the community".

The quality of clinical services offered in their division was rated very highly by respondents, with the majority describing them as "excellent" or "very good". However, one respondent noted that the majority of care in dermatology is done outside the AFP and outside the clinical facilities of the QEII.

In general, it was noted that while "we provide excellent care…wait times are increased and services decreased due to the AFP". Some respondents stated that the AFP: decreases efficiency; decreases drive to see patients; creates a level of control over physicians and "will, in the long run, serve as a negative force against the medical community."

C-1.3 Endocrinology

All eight members of the Division of Endocrinology responded to the questionnaire. Half of the members joined the DOM prior to the AFP being implemented in 1999, and could offer a pre and post AFP perspective. The majority of the respondents hold full-time positions (88%).

All respondents reported that they engaged in clinical services and research, with seven of the eight also stating that they engaged in teaching and administrative activities and six in telephone consultations. Other activities reported included, community outreach services and telehealth. One respondent noted participating in national specialty/medical leadership groups and [acting as a] resource to other universities/hospital in developing new models of care/education.

Two of the eight respondents who were part of the DOM prior to the AFP stated that they were able to undertake all of these activities before the AFP and two said they were not.

All respondents who were part of the DOM prior to the AFP cited an increase in their capacity to engage in all these areas of activities (one a "significant increase" and three a "moderate increase"). Three of the four respondents who became members after the AFP noted that the question was "not applicable".

All of the respondents who were part of the DOM prior to the AFP reported that the AFP had a beneficial impact on the delivery of clinical services in their Division. The following areas of activity were noted as having particularly benefited under the AFP: clinical services, administration, teaching, research, and telephone consultation, in that order.

The strengths of the AFP programme in terms of services provided included: that teaching, researcher and administrative work is valued; facilitation of "development of new (better) models of care"; increased volume of patients being seen; better contact with family physicians; and financial remuneration.

Half of the respondents noted drawbacks associated with working under an AFP and half did not. Those who did observed drawbacks noted: more bureaucracy and tendency for some people to "reach but not exceed deliverables". One respondent noted that salaries are set according to the subspecialty and not to the number of hours worked or ability/experience.

Only 29% of respondents believed that the FFS system should be reintroduced for the DOM but one respondent qualified this response by noting that FFS benefits the busy clinician but not the busy teacher, administrator or researcher. The majority of the respondents (71%) stated that it should not be reinstated.

Most of the respondents (88%) felt that the AFP had had a beneficial impact on the delivery of clinical services in their Division. It was noted that the triage system handles referrals more appropriately and more quality care is provided. There is better communication and team work.

All of respondents in the pre-AFP group observed an increase in the volume of clinical services under the AFP compared to FFS - three noting a "moderate increase" and two a "significant increase". Three of the four post-AFP respondent group noted the question was "not applicable". The three respondents who had noted a moderate increase in volume of clinical services also noted "no change" in the time available for patient consultation. The respondents who had noted a significant increase in the volume of consultations also noted a "significant increase" in the time available for patient consultation; however, one stated that the increase was due to the number of clinics, while the amount of time spent with the individual patient had significantly decreased.

Most respondents claimed that their method of practice had changed under the AFP. Half noted seeing more acute patients and using expanded practice nurses; three noted using physician extenders; two engaging in more disease prevention and one more time in clinical teaching. One respondent added that there is a prescribed ("from above") time limit for new patients which allows for a larger turnover and thus shorter wait time, but that the actual time spent with new patients has decreased.

Half of the respondents (50%) claimed that the AFP had affected utilization of inpatient facilities, outpatient care and use of diagnostic testing. It was commented that endocrinology has always been primarily outpatient based and that it is busier now with long wait lists but that that there is a high no show rate. Another observed that there has been a decrease in inpatients but an increase in ambulatory patients.

Most of the respondents (62%) noted that their working relationship with primary care providers had changed during the AFP with 12% noting no change and the balance (12%) choosing not applicable. Comments offered included: more accessible; more involvement and much closer liaison with new models of care. However, it was noted by two respondents that while availability or accessibility was strived for, primary care physicians still say that they cannot reach the specialist or that the wait list is longer. There appears to be some animosity from these groups [primary care providers] and they perceive that AFP physicians see less patients since there is no incentive to see a high volume. "They do not understand the demands of an academic physician".

The respondent group was fairly evenly split regarding whether or not the AFP had promoted a more integrated approach among the clinical service delivery providers.
Half (4) of the respondents noted a "moderate improvement" in patients' access to care in their division with one each noting a "significant improvement" or "no change". Two of the post AFP group noted "not applicable".

Most of the respondents (88%) reported that the triage system in place in their division was effective and they all stated that wait time/wait list information had been utilized to manage patient access.

The quality of clinical services offered in their division was rated very highly by respondents, with half describing them as "very good", two or 25% as "good" and one respondent felt that the quality of the service was "excellent". However, one respondent felt the quality of care was only "fair". Here it was noted that the quality of care could be improved with improved facilities for 'processing' patients appointments (i.e. calling to reduce the number of no shows) and better triaging for acute and urgent patients.

One of the respondents who recently joined the DOM, noted that overall the AFP seems reasonably equitable (compared to a previous location/position without an AFP) and that it did

not appear that physicians were working less hard. There is still, however, a problem in protecting researchers' time

C-1.4 Gastroenterology

Ten questionnaires were sent out to this Division and 10 were returned. Of this group, six joined DOM before 1999, and four later. It should be noted that one of the respondents who joined in 1999 commented that s/he had worked under FFS in another province and based answers on that experience. The majority (90%) of this respondent group, are full-time members of the Department and one is community-based.

All respondents reported that they engaged in clinical services and teaching activity, and 90% also stated that they engaged in research activities and administration, with half engaging in telephone consultations. Only two respondents claimed to engage in community outreach services and one identified telehealth. Another area of activity which was noted was supervision of Extended Role Nurses in IBD clinic. All but one of the respondents who were part of the DOM prior to the AFP stated that they were able to undertake all of these activities before the AFP.

All of the respondents who were part of the DOM prior to the AFP noted "no change" (4) or an increased capacity (2 "moderate" and 1 "significant") to engage in all of the identified activities under the AFP.

Five of the six respondents who were part of the Dalhousie DOM prior to the AFP reported benefits in terms of working under an AFP. The areas of activity that have particularly benefited include: clinical services; research and telephone consultations; community outreach services; and, teaching and administration, in that order.

While a couple of respondents felt the AFP has made no difference in terms of the services they are able to provide, strengths that were noted include: teaching, administration and research is taken into account and remunerated which also allows for recruitment of specialists; ability to provide "coordinated/comprehensive care" and different ways of delivering services other than traditional clinics; more collaborative clinics with nursing; able to deal with consultation without always seeing the volume. One respondent noted, however, that patient care is limited by the availability of beds and tests/procedures which has very little to do with how the physician is paid. Another stated that "…without the AFP, the DOM would have fallen apart….[as]…none of the sub-specialists would help with the medical teaching unit under a FFS system".

When asked if there were drawbacks associated with working under an AFP, most answered yes (7 of the 8 that answered this question). The following observations were offered:

- Lack of flexibility [with] excessive accounting for deliverables;

- A very inefficient system. Certain services are being undervalued therefore leading to increased work and numerous nights spent catching up on "deliverables";
- Too much departmental head control. Removal of direct incentives to see more patients.
- Pay equity amongst members needs to be addressed. Clinician/educators are as integral as researchers or administrators and should be paid on par;
- Forced to work in a hospital setting with reduced services to provide clinical services leading to increased wait times; and,
- The development of a major gap [and mistrust] between family physicians and non-AFP specialists with AFP physicians.

Only 30% of respondents believed that the FFS system should be reintroduced for the DOM. Half of the respondents stated that the AFP had had a beneficial impact on the delivery of clinical services in their division with 30% reporting a negative impact. The balance either did not respond of answered "not applicable". Positive comments offered included: better division of tasks without duplication (unfortunately, the administrative component is still within the hospital and not willing to introduce efficiencies); better chronic and acute care; allowed the group to work together resulting in improved coverage of urgent consults, patient and emergency consult with the Halifax Infirmary; better able to streamline services without worrying about financial implications. Wait lists were identified by one respondent as being an issue. "The AFP under present leadership shows no interest in dealing with GI manpower issues or wait lists. Two community-based specialist have not been replaced which has led to a marked increase in less urgent referrals (currently over 800 patients waiting with no appointment to date)." It was also noted that the AFP is only appropriate for certain individuals in the Department (in all Divisions). There needs to be a blend of AFP/non-AFP as those who benefit do so because their activity is predominately non-clinical and this has restricted manpower recruitment.

It was noted that the volume of clinical services has "increased moderately" under the AFP by five, or just over 70% of the seven respondents that answered this question. Two identified "no change". Eight responded to the question regarding time available for patient consultation and most noted "no changed" (4) or a "moderate increase" (1). But, three noted a decrease (two moderate and one significant).

Most respondents claimed that their method of practice had changed under the AFP with half of them noting they were using expanded practice nurses. Three noted seeing more acute patients, spending more time with patients; using physician extenders and spending more time engaged in clinical teaching with only one noting engaging in more disease prevention and health promotion activities. Two respondents noted spending more time in clinical research. It was also noted that less time was being spent with non urgent patients and on recheck visits. Referrals that don't need to be seen are being sent back and more information is being requested before a patient is seen. But, it was noted that [we are] "now on a crisis threshold of managing outpatients".

Most respondents (60%) noted that the AFP has not affected utilization of in-patient facilities, out-patient care and use of diagnostic testing. It was noted that: "the hospital is not set up efficiently (physicians are still under the CDHA's jurisdiction for facility related issues)"; "increased referrals have resulted in increased demand in outpatient services with no increase in funding from hospitals as well as reduced inpatient bed numbers"; there is "less outpatient care (or time to see outpatients) and decreased diagnostic testing"; and "our plan [the AFP] is under resourced for support services, especially endoscopy time".

Five of the six respondents who joined the DOM before 1999 claimed that their working relationship with primary care providers has changed during the AFP. Two of the respondents noted that primary care physicians are referring patients with little or no work up (even for routine complaints). This was noted particularly for primary care providers in CDHA. It was noted that "primary care is poorly organized in CDHA". It was noted that wait lists are very long for all but most urgent problems and that primary care physicians think that "we aren't seeing patients".

Four of the six respondents who joined the DOM before 1999 did not feel that the AFP has promoted a more integrated approach among the clinical service delivery providers. It was noted that "care is still provided by each division rather than a programmatic model focus on patient problems". The "only integration I have seen has been within our own division" [and not at the departmental level]. Those who responded positively noted that there is more program/disease management going on and that [there is a more integrated approach] for more complicated patients such as those with IBD.

Half of the six respondents who joined the DOM before 1999 felt that the AFP had had no change in patients' access to care in their division. Two felt that access had improved (one moderately and one significantly) while one noted a "significant decrease" in patient access to care.

70% reported that the triage system in place in their division was effective and 70% stated that wait time/wait list information had been utilized to manage patient access.

The quality of clinical services offered in their division was ranked over the full spectrum. One felt it was "excellent"; four "very good" and one "good". But, three only ranked the quality of clinical services as "fair" and one thought it was "poor".

C-1.5 General Internal Medicine

Sixteen questionnaires were sent out to this Division and 11 (73%) were returned. Of this group, six joined DOM before 1999 and five after. The majority of this respondent group (9) are full-time members of the Department and one is community-based. One respondent who is on leave did not respond to this question.

All respondents reported that they engaged in clinical services and teaching activity, and 63% stated that they also engaged in research activities, administration and telephone consultation. The activities of e-mail consultation and community outreach services were noted by one respondent each. Other areas of activity which were noted included: professional development/conferences/courses and service to provincial and national drug formulary committees. Five of the six respondents who were part of the DOM prior to the AFP noted that they were able to undertake all of these activities before the AFP. One was not.

Most of the respondents who were part of the DOM prior to the AFP noted an increase in their capacity to engage in all of these activities under the AFP (three a "significant increase" and one a "moderate increase". Two noted "no change".

Four of the six respondents who were part of the Dalhousie DOM prior to the AFP reported benefits in terms of working under an AFP. Two did not respond to this question. The areas of activity that having particularly benefited included: clinical services; teaching; administration; research; telephone consultations and community outreach services, in that order. Several respondents noted more time for, or improved quality of, teaching and other activities that do not generate income such as administration as strengths of the AFP. Still others noted a greater range and scope of services with more time and/or compensation for: inpatient services; community outreach; telephone consultations and other alternate modes of service. It was also noted that [the AFP] "allows for recruitment of other colleagues in specialties less remunerated by FFS so that I can benefit from their expertise".

Most of the respondents (78%) thought that there have not been any drawbacks associated with working under an AFP. One respondent did note a lowered income and another did express frustration at having "the uninformed believe that I do less work with I have objective data that our service delivery is higher".

Only one respondent (a recent member of the DOM), believed that the FFS system should be reintroduced for the DOM with 90% believing that it should not be reinstated. 90% of the respondents stated that the AFP had had a "beneficial impact" on the delivery of clinical services in their division. One respondent noted that the benefits are very significant. The group has been able to look at other areas of care delivery that there was not time for before such as community outreach and perioperative clinics. It is a more efficient use of health care resources as attention is not focused upon generating an income. Another respondent noted that the AFP has allowed the development of an academic division of Critical Care Medicine and the development of a Critical Care training program.

Three of the respondents who were in the DOM prior to the implementation of the AFP have noted that the volume of clinical services has increased under the AFP. Two identified "no change". "Not applicable" was chosen by the five respondents who joined the DOM after the implementation of the AFP. Similarly, three respondents of the pre-AFP group noted an increase

in time available for patient consultation and two "no change", with the post-AFP group noting that this question was "not applicable" to their situation.

All but one of the respondents in the pre-AFP group claimed that their method of practice had changed under the AFP with three of the five remaining noting they were using expanded practice nurses, spending more time with patients and spending more time in clinical teaching. Two respondents identified seeing more acute patients and using physician extenders. It was also noted that there was "planning more community outreach, expanding into new areas, e.g. perioperative and heart failure clinics with ERNs".

Five of the six of the pre-AFP group felt that the AFP has not affected utilization of in-patient facilities, out-patient care and use of diagnostic testing. It was noted that: more patients are being seen because the demand is increasing with the aging of the population but there are no more physicians to share the load. However, another respondent noted that in some jurisdictions, the number of clinical procedures have fallen. It was pointed out that "if another GI endoscopy suite were to be opened, the wait time for GI procedures would go way down with no more [money going] to the doctors". On a positive note, the AFP "has allowed development of pre-op clinic and in negotiation for vascular medicine clinic".

Five of the six respondents who joined the DOM before 1999 claimed that their working relationship with primary care providers has not changed during the AFP.

The majority of respondents who joined the DOM before 1999 felt that the AFP has promoted a more integrated approach among the clinical service delivery providers. It was noted that the way of "doing business" has changed, but it is unclear whether or not this is as a result of the AFP.

Four of the respondents who joined the DOM before 1999 felt that the AFP has not changed patients' access to care in their division. Two felt that access had "moderately improved".

Ten of the eleven respondents reported that the triage system in place in their division was effective with only eight stating that wait time/wait list information had been utilized to manage patient access.

The majority of the respondents (70%) described the quality of clinical services offered in their division as "excellent". The balance (30%) described it as "very good".

Two respondents acknowledged that the AFP allows time and remuneration for teaching and research; however, one respondent noted that in Nova Scotia we are paid far less than in other locations and we are likely to be "net losers of human resources unless a new AFP is available" and another makes reference to losing researcher(s) and to a "braindrain" in Nova Scotia. While the AFP in theory allowed time for research, this respondent noted that "[it] has not happened

because the department continues to scramble to meet clinical demands by shifting time allocated to research back into clinical service at short notice".

C-1.6 Geriatrics

Nine questionnaires were sent to this Division and eight (89%) were returned. Of this group, six joined DOM before 1999 and two after. All members of this Division are full-time members of the Department of Medicine.

All respondents reported that they engaged in clinical services, teaching and administrative activities, and all but one stated that they also engaged in research activities. Telephone consultation and community outreach services were noted by 64% of the respondents, with two identifying telehealth and one e-mail consultation. Other areas of activity which were reported included committee work and meetings as well as health policy consultation. Of the respondents who were part of the DOM prior to the AFP being implemented; two noted they were able to undertake these activities before the AFP, two said they were not. Two chose "not applicable".

Half of the respondents who were part of the DOM prior to the AFP being implemented reported an increase in their capacity to engage in all of these activities under the AFP. The other three either did not answer or checked "not applicable".

All of the respondents reported benefits in terms of working under an AFP. The areas of activity that have particularly benefited included: clinical services; teaching; administration and research; community outreach services and telephone consultations, in that order. The respondents overwhelmingly noted that an AFP is essential for geriatric medicine, as the current fee schedule does not cover the type of patient care needed for this discipline. "Without the AFP, there would be no Division of Geriatric Medicine." It was also noted by several respondents that this system allows for teaching and administrative work, as well as for more comprehensive patient care, with proper evaluation and follow-up.

Most of the respondents (62%) thought that there have not been any drawbacks associated with working under an AFP. However, drawbacks which were cited included: less clinical independence and less latitude to earn more by doing more, but the constraints of the AFP are restricting.

None of respondents believed that the FFS system should be reintroduced for the DOM and all respondents noted that the AFP has had a "beneficial impact" on the delivery of clinical services in their Division. Again, it was reiterated that the AFP is essential to this Division. One respondent noted, however, that the AFP this Division had in 1994 was more flexible than the current AFP.

Half of the respondents who were in the DOM prior to the implementation of the AFP, noted that the volume of clinical services has "moderately increased" under the AFP. One identified "no

change" and the other two stating that this question was "not applicable" to their situation. Conversely, only one of the respondents in the pre-AFP group noted an increase in time available for patient consultation, with half noting "no change" and two noting that this question was "not applicable" to their situation.

Half of the respondents noted that their method of practice had not changed under the AFP. Half noted they were using expanded practice nurses, two each reported spending more time with patients, spending more time in clinical teaching and using physician extenders, while only one noted engaging in more disease prevention/health promotion activities.

Two thirds of the pre-AFP group felt that the AFP had not affected utilization of in-patient facilities, out-patient care nor use of diagnostic testing. The respondents claimed that their working relationship with primary care providers had not changed during the AFP. The balance identified "not applicable" in both cases.

Two thirds of respondents who joined the DOM before 1999 also felt that the AFP had promoted a more integrated approach among the clinical service delivery providers. It was noted that working under the AFP appears to have drastically cut down on the number of unnecessary procedures (especially EMGs and endoscopes), that patients had been routinely subjected to undergo. Another respondent commented that they are now more able to work with family doctors in the community and in the hospital.

Half of the respondents who joined the DOM before 1999 felt that the AFP has not changed in terms of patients' access to care in their division but one thought that access had "significantly improved".

All of the eight respondents reported that the triage system in place in their Division was both effective and that wait time/wait list information had been utilized effectively to manage patient access.

The majority of the respondents (75%) described the quality of clinical services offered in their Division as "excellent". The balance (25%) described it as "very good".

In summary, it was again emphasized by several respondents that an AFP approach to remuneration is essential to Geriatric Medicine, where lengthy consultations, home or nursing home visits, and the involvement of a myriad of health care workers with subsequent team meetings, are the norm. Recognition of time spent teaching (other doctors) was also noted. However, one respondent noted that the current AFP does not value all of the activities, nor does it match remuneration benchmarks for similar job descriptions in other centres. The AFP should be revised in order to ensure retention of geriatricians.

C-1.7 Haematology

Seven questionnaires were sent out to this Division and six were returned. Of this group, five joined DOM before 1999 and one in 1999, after the AFP was adopted.

All members of this Division are full-time members of the Department of Medicine.

All respondents reported that they engaged in clinical services, teaching, research and administrative activities. Telephone consultation is an activity also noted by five of the respondents and telehealth, e-mail consultations and community outreach services were noted by one respondent each. Other areas of activity which were noted included local and national committee activities and journal and grant reviews.

The five respondents who were part of the DOM prior to the AFP being implemented were fairly evenly divided regarding whether or not they were able to undertake all of these activities before the AFP, with two stating they were able to and three that they were not. Three noted an increase in their capacity to engage in all of these activities under the AFP (two a "significant increase" and one a "moderate increase") and two found no change.

Five of the respondents reported benefits in terms of working under an AFP, with one pre-AFP member responding that there are "no benefits". The areas of activity that having particularly benefited included: clinical services; teaching; research; administration and telephone consultations in that order. The major advantage or strength of the AFP noted by several respondents had to do with patient care. Comments included:

- "[An] increased availability to see new patients and to deal with clinical problems more effectively";
- "… time to review the literature critically and apply it to a tertiary care patient";
- "allows methods to optimize care"; and,
- "….ability….to develop a coordinated clinical service".

Also noted was an increased research focus and resources to support the academic mission of the Department.

Half of the respondents thought that there have not been any drawbacks associated with working under an AFP and half thought there were. Drawbacks noted primarily had to do with the contract and its negotiations. "The renegotiation is cumbersome and has created conflict between AFP and non-AFP physicians." "The contract is not being honoured, not signed in time and not reaching market value." "The salary is not competitive with other departments across the country."

None of respondents believed that the FFS system should be reintroduced for the DOM and all respondents noted that the AFP had had a "beneficial impact" on the delivery of clinical services

in their division. It was noted that there is better triage consultation, team programmatic care has been facilitated, and services have expanded. However, it was also noted that with the drawbacks (listed) that [the division] is losing people.

Half of the respondents noted that the volume of clinical services has "moderately increased" under the AFP. One identified "no change", another, a "significant increase" and the other, the recent member of the Division noting that this question was "not applicable" to their situation. Most of the respondents in the pre-AFP group (four of the five) noted a "moderate increase" in time available for patient consultation with the other noting that this question was "not applicable" to their situation.

Only four of the five respondents in the pre-AFP group responded to this question. All of them noted they were using physician extenders and seeing more acute patients. Three note using expanded practice nurses, two note spending more time with patients, and one each spending more time in clinical teaching and engage in more disease prevention/health promotion activities. Another change noted was, seeing more less-acute patients with less follow-up. "Nurses now do follow-up on 5-10% of the patients that used to be followed by the physician."

Half of the respondents felt that the AFP had affected utilization of in-patient facilities, out-patient care and use of diagnostic testing. One felt it had not and two of the respondents chose "not applicable". Of note was that "the focus is more on quality of care than quantity of care". Two respondents noted less use of inpatient facilities or fewer inpatient beds and nurse resources in the medical day unit.

The respondents were evenly divided with respect to their working relationship with primary care providers. Two felt it had changed, two that it had not, and two identified "not applicable".

Four of the five respondents who joined the DOM before 1999 also felt that the AFP has promoted a more integrated approach among the clinical service delivery providers. It was noted that there is more (and better) team work. Patients are triaged and assigned to the earliest vacancy by any staff member if the referring doctor and patient are in agreement.

All of respondents who joined the DOM before 1999 felt that the AFP has improved patients' access to care in their Division (three "moderately improved" and two "significantly improved"). All of the respondents reported that the triage system in place in their Division was both effective and that wait time/wait list information had been utilized to manage patient access.

The majority of the respondents (66%) described the quality of clinical services offered in their division as "excellent". The balance (33%) described it as "very good".

C-1.8 Infectious Diseases

Four questionnaires were sent to this Division and all four were completed. Three members of this group joined DOM before 1999 and one after the AFP was adopted. All members of this Division are full time members of the Department.

All respondents reported that they engaged in clinical services, teaching and research activities, with three also partaking in administrative activities and telephone consultation. Other areas of activity which were noted included community continuing medical education, national committees and journal editorial board/reviewer.

The three respondents who were part of the DOM prior to the AFP being implemented reported that they were able to undertake all these activities before the AFP, with two stating no change in their capacity to engage in all of these activities one noted a "significantly increased".

Two respondents reported benefits in terms of working under an AFP, with one pre-AFP member responding that there are no benefits. Two respondents identified areas that have benefited under the AFP, with one respondent identifying clinical services, and the other identified teaching, research, and telephone consultations.

The strengths of the AFP in terms of services provided included the ability to "provide clinical care whenever and whatever needed without the tension or concern re billing and whether the patient (is) new of follow-up". The ability to be an academic physician was also identified as a strength of the AFP.

All of the respondents reported that there have not been any drawbacks to the AFP and, none thought that the FFS system should be reintroduced. All of the respondents believe that the AFP has had a beneficial impact on the delivery of clinical services. . It was noted that Infectious Disease is a Division with "no invasive procedures so suffered under FFS in terms of equitable remuneration …".

Half of the respondents noted that the volume of clinical services had not changed under the AFP. One identified a moderate increase and the other, the recent member of the Division, noting that this question was not applicable to their situation. All three of the respondents in the pre-AFP group noted no change in time available to patient consultation; however, one respondent clarified this by stating that while time available has not increased, the time spent has, due to being short staffed.

Two of the respondents noted seeing more acute patients under the AFP, with one each noting using expanded practice nurses and spending more time with patients. Another change identified was using clinical nurse specialists but it was noted that this is not all a result of the AFP.

All of the pre-AFP respondent group felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected, however it was noted that there is still "road blocks" in diagnostic services. Similarly, this group all felt that their working relationship with primary care providers had not changed.

One respondent felt that the AFP has promoted a more integrated approach among the clinical service delivery providers; one did not and two chose "not applicable". All of the respondents who joined the Dom before 1999 felt that the AFP had not changed patients' access to care in their Division and they all reported that the triage system in place in their Division was effective. However, they were divided on whether or not the wait time/wait list information had been utilized to manage patient access.

All of the respondents described the quality of clinical services offered in their Division as "excellent" with one respondent noting that it has always been excellent.

In summary, one respondent reiterated that the strength of the AFP for a division with no invasive procedures but a relatively heavy workload lies in the more equitable remuneration.

C-1.9 Oncology

Ten questionnaires were sent to this Division and 9 were returned. Three members of this group joined DOM before 1999 and six after the AFP was adopted.

Eight of the nine respondents are full-time members of the Department of Medicine.

All respondents reported that they engaged in clinical services, teaching and research, with eight also partaking in administrative activities. Four identified additional activities as telephone consultation and community outreach services, and two identified telehealth and e-mail consultations. Other areas of activity which were noted included advisory boards on developing provincial guidelines and treatment.

The three respondents who were part of the DOM prior to the AFP being implemented said they were able to undertake all of these activities before the AFP but also noted that they have either observed "no change" (one) or a "moderate decrease" (two) in their capacity to engage in these activities under the AFP.

None of respondents of the pre-AFP group reported a benefit in terms of working under an AFP. However, one of this group, did respond to the question regarding the areas of activity that have benefited under the AFP. The areas noted included: teaching; research; and administration. On the other hand, when asked to comment on the strengths of the AFP, only two specifically noted no effect or value, to the point of "a hindrance". Two respondents reported that strengths

included the fact that, under the AFP, there are no constraints on the time spent with individual patients which allows for better care delivery. This was emphasized as being particularly important for new consults as well as the fact that follow-up over the phone is possible under an AFP, which saves travel on the part of the patient. Two other respondents noted that the AFP allows for teaching, research and spending time "keeping abreast of changes in the field of medical oncology".

Eight of the respondents thought that there have not been any drawbacks associated with working under an AFP. This includes responses from both the pre- and the post-AFP group. The drawbacks cited centred around monetary issues. The DOM AFP payment scheme is considered "much lower compared to other provinces" and "does not reflect the market value of this specialty which is an issue when it comes to recruitment". Two of the respondents identified shadow billing as being a problem. It [shadow billing] is "inaccurate, misleading and ineffective in capturing medical oncology workload" and "does nothing to reflect what we do in Nova Scotia". But, none of the respondents thought that the FFS payment system should be reintroduced.

Two respondents felt that the AFP had had a beneficial impact on the delivery of clinical services in their Division, while three of the respondents noted that the delivery of services has remained unchanged.

All of the respondents from the pre-AFP group noted that the volume of clinical services has increased under the AFP (two noting a "significant increase" and one a "moderate increase"). Two from this group reported "no change" in time available for patient consultation; however, one respondent felt time available has "moderately decreased".

Two of the respondents noted spending more time with patients under the AFP, with one each reporting spending more time in clinical teaching. Another change identified was more 'chart checks' and phone calls with patients instead of seeing them in person.

All of the pre-AFP respondent group felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected. Similarly, this group felt working relationships with primary care providers had not changed.

None of the pre-AFP respondent group believed that the AFP had promoted a more integrated approach among the clinical service delivery providers. 50% of respondents felt that the AFP had not changed patients' access to care in their Division. Most (approximately 65%) of the respondents reported that the triage system in place in their Division was effective and that wait time/wait list information had been utilized effectively to manage patient access.

Only two of the respondents described the quality of clinical services offered in their division as "excellent" with four describing it as "very good" and three "good".

Several respondents identified areas which needed attention in renegotiating the AFP including clearly defined deliverables and a more transparent pay structure according to predefined variables such as experience/length of clinical service. "Remuneration should be in line with other major centres across the country – it is currently one of the lowest". Other respondents referred back to their concerns with shadow billing identified earlier. It was agreed that an AFP type of remuneration system is necessary for this service, but there is concern with how data is collected to monitor or document the work done.

C-1.10 Nephrology

Eleven questionnaires were sent to this Division and ten were returned. Four members of this group joined DOM before 1999 and six after the AFP was adopted. All are full-time members of the Department.

All respondents reported that they engaged in clinical services, teaching and administration with eight also partaking in research activities. Seven identified telephone consultation, two identified and community outreach services and only one identified telehealth as additional activities. Other areas of activity which were noted included service on committees or boards that are not part of CDHA.

Half (two) of the pre-AFP respondents said they were able to undertake all of these activities before the AFP and two also noted a "significant increase" in their capacity to engage in these activities under the AFP. It should be noted that three of the respondents that joined the DOM after the AFP was adopted also noted an increase ("moderate") in their capacity to engage in the identified activities under the AFP.

The majority of the respondents (80%) reported benefits in terms of working under an AFP. Only six of the eight that noted benefits respond to the question which identifies the areas of activity that have benefited. All six noted clinical services, teaching, and administration, while five noted research. A couple identified telephone consultation and community outreach services as also having benefited. Four of the respondents made reference to more time for teaching activities, and administration and two also specified time for research as a strength of the AFP. It was also noted that the AFP "secured funding such that a full complement of [nephrologists] are working at CDHA, allowing for reasonable balance between clinical services and other important responsibilities". This [recruitment] has "shortened clinic wait times significantly".

Six or 60% of the respondents thought that there are drawbacks associated with working under an AFP. Five of these respondents are members who recently joined the DOM. Drawbacks identified included: a payment scheme based on seniority verses contribution; expectations to do other activities despite a full workload; non-competitive remuneration; and still shadow billing. Two respondents identified delays in ("fair") renegotiating renewal of AFP which have "imperiled recruitment and have let our income fall enticing Department members elsewhere".

But, all but one of the respondents thought that the FFS payment system should not be reintroduced.

All of the respondents who were members of the DOM prior to the AFP being implemented felt that the AFP had had a "beneficial impact" on the delivery of clinical services in their division. Half of the post-AFP group also felt that the AFP has had a beneficial impact on delivery of patient services, while the other three respondents chose "not applicable". One beneficial impact identified was "the ability to run clinics in PEI saving patients considerable travel time and money". Another, was the fact that attention can now "be directed towards patients that are not doing well verses seeing everyone at each dialysis simply for billing".

More of the respondents from the pre-AFP group noted that the volume of clinical services has decreased than increased under the AFP and most noted "no change" in time available for patient consultation..

When asked if their method of practice had changed under the AFP, half of the respondents chose "not applicable". The other half noted using expanded practice nurses. Two respondents noted spending more time in clinical teaching and seeing more acute patients. Spending more time with patients and using physician extenders was noted by one respondent each. Another change identified was more research.

40% of the respondents felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected. 20% felt that it had and noted that "more out patients are seen so patient facilities are used to a greater degree, to the point that clinic sizes and frequency is limited".

Most of the respondents a felt that their working relationship with primary care providers had not changed, with the balance choosing not applicable.

Whether or not the AFP has promoted a more integrated approach among the clinical service delivery providers was evenly divided with 33% choosing yes, 33% choosing no and 33% stating it was "not applicable". It has promoted a more programmatic patient –centres approach and it allows for individuals to work in areas they like or have expertise in without worrying about financial repercussions.

44% of respondents felt that the AFP had not changed patients' access to care in their Division, with 33% noting an improvement. All of the respondents reported that the triage system in place in their division was effective and that wait time/wait list information had been utilized to manage patient access.

The majority of the respondents described the quality of clinical services offered in their division as "excellent" with several identifying "very good".

Several respondents reinforced the fact that they would not like to see the FFS system reinstated. The model was "archaic [with] fees based on clinical practice years ago and no change to reflect the clinical work done in elderly patients". A FFS system would not maintain the research, administration and teaching component and "medical staff would be lost severely impairing the Medical School". It was noted that the AFP is a good model but funding needs to expand as the clinical work increases.

C-1.11 Neurology

Fourteen questionnaires were sent to the Neurology Division and thirteen were returned. Ten members of this group joined DOM before 1999 and three after the AFP was adopted. Ten (77%) are full-time members of the Department and three (23%) are community-based.

All respondents reported that they engaged in clinical services and teaching, with eleven also doing research and nine partaking in administrative activities. Four identified additional activities as telephone consultations and two as e-mail consultations as additional activities. Other areas of activity which were noted included work in national level organizations and work in health policy.

Six of the ten respondents who were part of the DOM prior to the AFP being implemented said they were able to undertake all of these activities before the AFP with two noting a "significant increase" in their capacity to engage in these activities under the AFP. Four noted a "moderate increase" and four noting "no change".

The majority (70%) of the pre-AFP respondents reported benefits in terms of working under an AFP. Of these, identified areas of activity that have benefited as clinical services (5) and teaching, research and administration (four each), while telephone consultation and telehealth were identified by only one respondent each. The noted strengths of the AFP in terms of services provided include:

- "Better quality of life and practice;
- Better quality of care and teaching;
- The AFP not only provides stable funding for activities that were previously dependent on fee generation from clinical services but also activities that do not have direct patient contact;
- Able to spend more time with patients and their families thus providing better clinical care;
- More flexible clinic time for difficult patients; and,
- Ability to engage in teaching activities."

Respondents also commented that the AFP has provided "stability of funding" and that "services are funded more realistically".

Two of the respondents who had noted benefits in working under an AFP but did not identify a specific area, did offer the following comments on the strength of the AFP: "my work profile has stayed about the same. I am working more than before the AFP. I am paid more than before the AFP'"; and, "…we should have less 'worry' about billing for services and concentrate more on teaching/administration/research; however, the reality has been my clinical load (as a consequence of demand) is probably higher than before AFP".

The majority (85%) of the respondents (pre- and post-AFP) thought that there are no drawbacks associated with working under an AFP; however, it was noted that more clinic time is needed. But, to increase the number of clinics, the funding must also increase. Identified drawbacks of the AFP had to do with remuneration and renegotiating of the contract. Comments included: "insecurity as to whether [or not the AFP will] continue and for how long"; "parity with other AFPs across the country"; and, an AFP agreement must be certain that new programs will be covered or [that] portion of the agreement [will be] renegotiated". All respondents thought that the FFS payment system should not be reintroduced.

All of the pre-AFP respondents felt that the AFP has had a "beneficial impact" on the delivery of clinical services in their division. One beneficial impact identified was more effective collaboration to provide services and clinical care coverage, not just for CDHA but for the Maritimes. Other benefits noted related to clinical services and to monetary compensation:

- "Can participate fully in 'poorly' paid clinical activities without concern that these activities will generate lower fees than procedures;
- More appropriate resources for appropriate patients;
- Services now perceived in a more realistic light rather than as a cash cow; and,
- Increase in remuneration has been a major reason to stay".

50% of the respondents from the pre-AFP group noted that the volume of clinical services had "moderately increased" under the AFP; 20% thought it had 'significantly increased" and 20% noted "no change". Conversely, 50 % of this group cited "no change" in time available for patient consultation with the other half noting an increase (30% a "moderate increase" and 20% a "significant increase").

Most of the respondents noted a change in their method of practice under the AFP. The use of expanded practice nurses was reported by most (six) of the respondents followed by spending more time with patients and in clinical teaching (five and four respondents respectively). Three respondents noted seeing more acute patients using physician extenders and two engage in more disease prevention and health promotion activities. Another change identified was "spending less time on academic activities because of burgeoning clinical duties".

80% of the pre-AFP respondent group felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected. It was noted that there is "less use of

tests to meet financial goals". Another respondent noted that "there has been increased utilization due to increased demand [but] we are better organized and strategically positioned to respond to the demands therefore usage goes up".

Most (60%) of the respondents a felt that their working relationship with primary care providers had not changed with the balance feeling it had. It was noted that there is more time to answer concerns and telephone consultations are used more readily. It was also noted that the "freedom from necessity to conform to MSI procedures enables a broader range of interaction with primary care physicians ……without necessarily booking patients into clinic to a consult".

The majority of the respondents thought the AFP has promoted a more integrated approach among the clinical service delivery providers. It was noted that, "as a group we seem to collaborate more successfully with other divisions and departments". It [integrated approach] is predominant and this has had a beneficial effect. "Division members are free to participate in those areas which are [their] strengths regardless of fee generation factors."

Most (70%) of the pre-AFP respondents felt that the AFP improved patients' access to care in their division. All of the respondents reported that the triage system in place in their division was effective and that wait time/wait list information had been utilized to manage patient access.

Of the twelve respondents who answered the question on the quality of clinical services offered in their division, 67% found it "excellent", 25% "very good" and 8% "good".

It was emphasized by several respondents that the value of the AFP to this Division could not be overstated. Without the AFP the quality of care would be markedly worse, the division would be considerably smaller and specialists would have left (or not be recruited). The AFP allows for a balance between a commitment to clinical care and more stimulating activities such as education, research, administration and community outreach services. Without the AFP, there would be no medical school work or research. The academic mandate would be seriously damaged.

C-1.12 Palliative Care

All five Division members completed this questionnaire. They all joined DOM after the AFP was adopted, and all are full-time members of the Department.

All respondents reported that they engaged in clinical services, teaching and research with four also partaking in administrative activities. Three also identified telephone consultation community outreach services and two also engage in telehealth work. Other areas of activity that were noted included home visits and daily case review/consultation in order to manage patients on palliative care home service.

Only one of the respondents said s/he was able to undertake all of these activities before the AFP; two were not and two chose "not applicable". Two noted an increase in their capacity to engage in these activities under the AFP, one noted "no change" and the other two chose "not applicable".

The majority (80%) of the respondents reported benefits in terms of working under an AFP and one did not think there were benefits in this system. Identified areas that have benefited were teaching and research (four respondents each); clinical service, administration and outreach services (three each); and telephone consultations (two). Several respondents emphasized that palliative care "requires time with patients and their families, which is a strength of the AFP that would not be possible with a FFS system". Quality versus quantity of service is recognized, as are non-clinical services and teaching. It allows for an integrated service model, including consultations with primary care providers.

Three of the respondents identified drawbacks associated with working under an AFP; primarily to do with administrative issues, such as the constant "justification/tracking of everything done", difficulty in tracking non-insured clinical activity and pay fluctuations that are not related to delivery of service but rather to "internal departmental needs/policy/whims". But, none of the respondents think that the FFS payment system should be reintroduced.

60% of the respondents felt that the AFP had had a "beneficial impact" on the delivery of clinical services in their Division. None felt that it did not, but the balance of the respondents chose "not applicable". The greatest beneficial impact has been on patient services both in clinic and in home visits. There is better patient satisfaction.

Three respondents noted that the volume of clinical services has increased under the AFP as has the time available for patient consultation. For both of these questions, the remaining two respondents chose "not applicable".

All five of the respondents noted a change in their method of practice under the AFP, particularly relative to spending more time in clinical teaching. Spending more time with patients was cited by 60% of the respondents and 40% are using more physician extenders or expanded practice nurses. Seeing more acute patients and engaging in more disease prevention and health promotion activities was a change noted by one respondent. Another change identified was participating in an integrated service model, in partnership with continued care and primary care health care workers.

All of the respondents felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected. It was noted that there is an increased emphasis on home care.

Most (60%) of the respondents a felt that their working relationship with primary care providers had changed, with one respondent feeling it had not and one chose "not applicable". It was

noted that there are more communication opportunities and more time to interface with primary care providers and getting them involved with palliative care. Under the AFP, "we are better able to act as a resource, facilitate appropriate care and improve coordination of care".

Three of the respondents thought the AFP has promoted a more integrated approach among the clinical service delivery providers. Again, it was pointed out that there is more coordination of primary care providers with other health care services. Four of the five respondents felt that the AFP improved patients' access to care in their division and one thought that there had been no change. All of the respondents reported that the triage system in place in their Division was effective but one respondent thought that wait time/wait list information had not been utilized to manage patient access.

The quality of clinical services offered in the Division was thought to be "excellent" by three or 60% of the respondents, and two rated it as "very good".

While the two respondents who offered general comments did qualify that they were not employed prior to the AFP, they both pointed out that the AFP is a necessity for this Division. Without an AFP, services would suffer and the quality of patient care would be compromised as would teaching and research. "Our ability of providing any services….outside of the typical clinic setting would be the greatest loss (e.g. home visits, outreach clinical activity)."

C-1.13 Physical Medicine and Rehabilitation

Six of the seven Division members completed this questionnaire. (The eighth member listed did not start until November 1, 2004, thus s/he was not included in this survey.) Half joined DOM before the AFP was adopted and half 1999 or later. Five are all full-time members of the Department and one is community-based.

All respondents reported that they engaged in clinical services and teaching activities. Four also identified partaking in administrative activities, telehealth and telephone consultations, three in research and one in e-mail consultation. Another area of activity which was noted was administration of the residency program.

Two of the three respondents who were members of the DOM prior to the AFP being adopted said they were able to undertake all of these activities before the AFP while one was not. The three of the post-AFP group chose "not applicable". Conversely, an increase in their capacity to engage in these activities under the AFP was noted by two of the pre-AFP group and two of the post-AFP group with one, pre-AFP member, noting a 'significant decrease". One, post-AFP member, chose "not applicable".

Half of the respondents reported benefits in terms of working under an AFP; however, one pre-AFP member did not think there have been benefits in this system. Areas that were noted to

have benefited were: clinical services (noted by three respondents) and teaching, research, administration and telehealth each identified by two respondents.

The strengths of the AFP noted centered around:

1) better patient care ("increased patient focused practice"; "improved patient access to care"; "allows the time needed for ….complicated rehabilitation patients");
2) teaching (increased/adequate time for teaching);
3) research; and,
4 remuneration ("less pressure to grind through volumes of patients to maintain a salary base").

Two of the respondents (both pre-AFP members) thought that there have been drawbacks associated with working under an AFP. Comments included "shadow billing somewhat defeats the purpose". However, the majority of the respondents (67%) did not identify any drawbacks and 67% thought that the FFS payment system should not be reintroduced.

Half of the respondents felt that the AFP had had a beneficial impact on the delivery of clinical services in their division with only one respondent identifying a "negative impact" and, the balance of the respondents choosing "not applicable". It was commented that under the AFP, remuneration not only covers teaching and administration activities but also allows for good patient care including family conferences and teleconferences that were not covered under the previous FFS system.

Half of the respondents noted that the volume of clinical services had not changed under the AFP, with only one respondent citing a "moderate increase". Increased time available for patient consultation was reported by half of the respondents, with two finding "no change".

Five of the six respondents observed some change in their method of practice under the AFP. Four identified spending more time in clinical teaching while three cited spending more time with patients and engaging in more disease prevention and health promotion activities. Two are using expanded practice nurses and one is using physician extenders. Two respondents also noted having more time for research development or activities.

Half of the respondents felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected. It was noted that there is less of a tendency to request diagnostic tests and therapeutic interventions simply to generate money, resulting in better patient care and less cost to the system.

Most (67%) of the respondents felt that their working relationship with primary care providers had not changed. One post AFP respondent identified a change citing "more time to talk with GP's".

The three post-AFP respondents thought the AFP has promoted a more integrated approach among the clinical service delivery providers citing more time for communication; however, the three 'long-time' members of the division thought that it had not, clarifying that by stating that rehabilitation services have traditionally been more integrated. Most (five) of the respondents reported that the triage system in place in their division was effective and five thought that wait time/wait list information had been utilized to manage patient access.

The quality of clinical services offered in the Division was thought to be "excellent" by three or 50% of the respondents; two rated it as "very good" and one as only "fair".

In summary, one respondent offered the comment that the "AFP has allowed recruitment in the last year that should help [wait times and patient flow]" but noted that issues outside the AFP, like community resources and outpatient non-physician services, have an impact on service delivery as well.

C-1.14 Respirology

Five of the seven Division members completed this questionnaire. Four had joined DOM before the AFP was adopted and one after. All are full-time members of the Department.

Only four of the respondents answered the first five questions regarding their activities. All reported that they undertook clinical services, teaching and administration activities as well as telephone consultations. One respondent also identified e-mail consultation. Other areas of activity mentioned included membership on a national committee and "CME presentations for family physicians and other specialists".

Three out of the four respondents said they were able to undertake all of these activities before the AFP had been adopted, while one was not. Half of the respondents stated that their capacity to engage in these activities under the AFP has "significantly increased". One noted a "moderate increase" and one felt that there has been "no change".

80% of the five respondents reported benefits in terms of working under an AFP, with one pre-AFP member disagreeing. Areas that have benefited were: clinical services, administration and telephone consultations (noted by three respondents); teaching (identified by two respondents); and, research and telehealth being noted by one respondent each.

A strength of the AFP that was observed by two respondents was the option of being able to do telephone consultations with patients who have been previously seen. It was added that this is a benefit to the patient as well. And, telephone communication is also offered to family physicians throughout the province. Compensation for program development, meetings and work on committees was also acknowledged.

Half of the pre-AFP members thought that there have been drawbacks associated with working under an AFP. The level of remuneration was cited as still being low compared to the rest of the country, which hampers recruitment. The continued reliance on shadow billing as a means of assessing value for services was seen to be a problem. It was noted that the only activity that is easily translated into value for money are clinical services and that is what is recorded in shadow billing. Conversely, half of this group thought that there were no drawbacks; pointing out that they are now remunerated for teaching activities as well as departmental administration.

None of the respondents thought that the FFS payment system should be reintroduced and they all felt that the AFP has had a "beneficial impact" on the delivery of clinical services. The ability to recruit and retain members has improved with the AFP, which has a positive impact on service delivery. It was again reiterated by two respondents that the ability to be able to do more over the phone, rather than bringing patients back for a return visit, has allowed for more patients to be cared for. "Under FFS, all patients made return visits….".

All of the respondents noted that the volume of clinical services has increased under the AFP (60% noted a "significant increase" and 40% a "moderate increase"). However; 60% of the respondents reported that time available for patient consultation had increased, with one noting "no change" and the other a "moderate decrease".

Four of the five respondents noted a change in their method of practice under the AFP. Three identified using expanded practice nurses and/or physician extenders; two identified spending more time in clinical teaching, seeing more acute patients and engaging in more disease prevention and health promotion activities; and spending more time with patients was identified by one respondent. More telephone consultation with patients was again noted specified. And, one respondent noted that the AFP "has been more restricting of acute care service that has led to greater time allotted to ambulatory care delivery".

Half of the pre-AFP group felt that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had been affected by the implementation of the AFP and the other half not so. It was noted that there is as higher volume of patients through outpatient clinics and that more disease education and regular contact by nurses or respiratory therapists helps prevent visits to the emergency department.

The working relationship with primary care providers was thought to have changed by half of the pre-AFP group and not changed by the other half. One respondent commented that they hoped that they are "able to be more responsible to primary care".

Three pre-AFP respondents thought that the AFP has promoted a more integrated approach among clinical service delivery providers, citing better team work with other (multiple) health care professionals (respiratory therapists, nurses) working together. However; the other respondent stated that factors unrelated to the AFP (hospital budgets for other health care delivery personnel) impede a more integrated approach to clinical service delivery.

Patient access to care was thought to have improved by all of the respondents with most citing a "significant improvement". All of the respondents reported that the triage system in place in their division was "effective" and they all thought that wait time/wait list information had been utilized to manage patient access.

The quality of clinical services offered in the division was thought to be "excellent" by two or 40% of the respondents with the other three finding it "very good".

In summary the respondents reiterated that:

1) the AFP has allowed for more telephone consultations and follow-up letters/test results to physicians or patients, without having the patient come into clinics;
2) an over reliance on shadow billing as the primary marker of value, which does not reflect teaching, research or administrative activities; and,
3) while the AFP has improved remuneration to physicians for services provided, it is still lagging behind the rest of the country which impedes recruitment.

While one respondent noted that due to changes to the clinic and making more use of non-physician health care staff, the health education programs have been expanded and waiting times for new patients has been shortened; another thought that the quality and quantity of services could be further improved is more highly trained healthcare professionals like physician extenders or ERNs were used.

C-1.15 Rheumatology

All six Division members completed this questionnaire. Four had joined DOM before the AFP was adopted and two after. Half are full-time members of the Department and half are community-based.

All six respondents reported that they engaged in clinical services and teaching, with four also partaking in research and administration activities. Three also conduct telephone consultations, with e-mail consultation and community outreach services being cited by one respondent each.

Half of the pre-AFP group of respondents cited that they were able to undertake all of these activities before the AFP had been adopted and the other half were not. Of this group, half stated that their capacity to engage in these activities under the AFP had "not changed", with the other two citing an increase (one "moderate" and one "significant"). Similarly, half of this group thought that there have been benefits in terms of working under an AFP, with the other half disagreeing. Both post-AFP respondents thought that there are benefits. The area cited as having benefited the most is teaching (identified by four respondents), followed by clinical

services, research and administration (identified by three respondents each). Telephone and e-mail consultations were identified by one respondent each.

Several respondents commented that the AFP allows for teaching as well as research and administration. It was pointed out that it facilitates a closer integration of clinical and academic activities. One respondent noted that prior to the AFP, they would not have been active on various (admission/training) committees. Another pointed out that the AFP has significantly benefited recruitment and retention of physicians. Regarding patient care, it was pointed out that under the AFP the quality of patient care can be maintained – "[we] can look after sicker, more complex, patients which is not remunerated well under FFS".

Half of the respondents (both pre- and post-AFP) thought that there have been drawbacks associated with working under an AFP. Drawbacks cited included less contact with family physicians and having to count everything (meetings attended, patient visits, procedures). "I feel more like a boy scout than an independent professional." And, another respondent had concerns about the inability to have input in defining their work load.

None of the respondents thought that the FFS payment system should be reintroduced and all of the pre-AFP group of respondents felt that the AFP has had a "beneficial impact" on the delivery of clinical services. A benefit of note is the ability to retain physicians. The post-AFP group of respondents chose "not applicable" for this question.

Most of the respondents noted that the volume of clinical services has increased under the AFP (50% noted a "moderate increase" and 17% (or one) a "significant increase") with one respondent citing "no change". Conversely, all four of the pre-AFP respondents felt that the time available for patient consultation had not changed as a result of the AFP.

Half of the respondents noted a change in their method of practice under the AFP. Three identified spending more time in clinical teaching and two identified seeing more acute patients, with one spending more time with patients. It was noted that alternative methods for access to care is needed in this discipline and the AFP is thought to provide the opportunity for this to occur.

The Division was evenly divided on whether or not the utilization of in-patient facilities, out-patient care and use of diagnostic testing had been affected by the AFP. It was noted that the AFP facilitated more outpatient care as well as the development of an ambulatory program.

Most of the respondents (67%) did not think that the working relationship with primary care providers had changed, although one respondent did note that there is less contact with primary care physicians.

Half of the pre-AFP respondents thought the AFP has promoted a more integrated approach among the clinical service delivery providers and half did not.

Patient access to care was thought to have improved by three of the respondents and one thought there had not been a change. All of the respondents reported that the triage system in place in their Division was effective and they all thought that wait time/wait list information had been utilized to manage patient access.

The quality of clinical services offered in the Division was thought to be "excellent" by four or 60% of the respondents, with the other two finding it "very good".

As with other Divisions, it was noted that the AFP has allowed for recruitment and retention of physicians and that if the FFS model was re-instituted, more physicians would leave the province. The AFP has been a great benefit to the DOM, allowing for improved quality and quantity of care, teaching and research activities. It was also noted that, with the development of new therapies, more administration is needed to follow individual patient care.

C-1.16 Critical Care

Nine questionnaires were sent to this Division and seven, or 78%, were returned. This Division became part of the DOM in 2004; however, many of the respondents have been in the Dalhousie Faculty of Medicine for some time. Six of the seven are full-time.

All respondents reported that they engaged in clinical services and teaching, with six having additional administrative duties and five are also active in research activities. Telephone consultation and community outreach services were identified by one respondent as added activities. Other areas of activity cited were national level committees or executive memberships as well as teaching at the national level (Royal College).

Most of respondents (four) were able to undertake all of these activities before the AFP, while two were not. Over 70% of the respondents have observed an increase in their capacity to engage in the identified activities under the AFP, with 43% noting a "significant increase" and 29% a "moderate increase". Only two (29%) have observed "no change".

The majority of respondents (86%) reported benefits in terms of working under an AFP. Activities that particularly benefited included clinical services (identified by four respondents); teaching, and research (identified by two respondents each) and telehealth and telephone consultation by one respondent each. A common strength of the AFP that was noted by several respondents is time for activities that do not generate income, such as teaching and research. It was noted that jobs are defined with deliverables. "It takes the money out of the equation for patient care" and, due to scheduled time off, it was felt that medicine is practiced more safely.

Five of the seven respondents thought that there are drawbacks associated with working under an AFP. There is an increased workload for less money. And, remuneration is not felt to be up to par with the rest of the county. The bureaucratic structure of the Department and the Division

was cited as a drawback by two respondents. However, all of those who responded (six) thought that the Fee for Service payment system should not be reintroduced.

Over 70% of the respondents felt that the AFP had had a beneficial impact on the delivery of clinical services in this division. Only one thought that it hadn't and one chose "not applicable". The AFP has allowed for more clinicians to be hired and has provided for better on call support.

Three respondents noted that the volume of clinical services has increased (one "moderately" and two "significantly") and three noted "no change". Only one felt that it had decreased (moderately). Time available for patient consultation was seen to have increased by only one respondent, with three noting "no change" and three choosing "not applicable".

Only four respondents identified how their method of practice had changed under the AFP. Two identified seeing more acute patients and spending more time with patients; using physician extenders and expanded practice nurses, engaging in more disease prevention and health promotion activities, and spending more time in clinical teaching were each noted by one respondent. Another change identified was more time for administration and research.

Most of the respondents stated that the utilization of in-patient facilities, out-patient care and use of diagnostic testing had not been affected by the AFP. 14% felt that it had and specified the development of a pre-op clinic and a vascular medicine clinic as examples.

Most of the respondents believe that their working relationship with primary care providers has not changed and most felt that the AFP promoted a more integrated approach among the clinical service delivery providers. However, one did not, and noted a breakdown in the communication and collegiality in the Division.

Most of respondents (57%) observed that the AFP had not changed patients' access to care in their Division, with only one noting an improvement. Only three respondents answered the question regarding whether or not the triage system in place in their Division was effective, and they all answered in the affirmative. Only four responded to the question whether or not wait time/wait list information had been utilized to manage patient access, and they were evenly divided in their answers.

The majority of the respondents described the quality of clinical services offered in their Division as was "very good". One ranked the quality of care as "excellent" and one as "good".

In conclusion, it was emphasized that the Division is under-funded relative to national standards and therefore recruitment will be compromised unless the base salary is increased substantially.

C-2 DALHOUSIE UNIVERSITY FACULTY OF MEDICINE SENIOR OFFICIALS

Only one respondent returned the completed questionnaire. The impact of the AFP on the DOM was described as "excellent", and was seen to have "moderately improved" clinical services provided by DPM physicians. Likewise, teaching activities were considered to have "moderately improved", while research had "significantly improved". The respondent also reported that administrative activities under the AFP had "moderately improved". New models of clinical care had evolved, as a result of the DOM AFP, and the AFP was considered to have contributed to a balance of activities, without the pressure of having to generate clinical earnings.

Strengths of the AFP included more appropriate clinical care; more teaching; more and better quality research; more effective administration; more accountability for activities and services provided. Disadvantages of AFPs included the external perception that DOM members have "slacked off" under the AFP, which have resulted in "some strained relations".

The DOM AFP was seen to have contributed to a more integrated approach among clinical service providers, with more interaction and collaboration among the division of the DOM.

"The AFP has been the tool that has kept the DOM as a united entity. Without it, there would be no Department of Medicine as it exists today, and no Department of Medicine would have serious negative implications for the CDHA, Dalhousie University Medical School, and health care in general in Nova Scotia."

C-3 DALHOUSIE DOM MEDICAL RESIDENTS

Questionnaires were sent to 65 residents and 42% of the questionnaires were returned.

Most of the respondents (52%) assessed the quality of the teaching provided by DOM affiliated physicians as "very good", with 30% assessing it as "good". Several thought it was "excellent" and only one thought it was "fair". Almost three quarters of the respondents felt that the quantity of time allocated to teaching was "adequate", with over one quarter feel that it was "inadequate".

Twenty three of the 27 respondents felt they were able to compare their academic experience working under an AFP with other experiences under a FFS system. Most (52%) of those who felt that the question was applicable, found "no difference" in their academic experience under AFP versus FFS. 20% thought that it was "moderately better" and slightly more found it "significantly better".

The majority (63%) of the respondents were not familiar with the DOM triage/wait time/wait list reporting system. Of those who were familiar with the system, half believe that it is utilized effectively to manage access to DOM services and 30% thought it wasn't. 20% did not respond.

Access to specialists in the DOM was ranked as "very good" by 48% of the respondents, with 30% finding it "good". Several respondents ranked access to specialists as "excellent"; however, a couple felt that it was only "fair". The number of patients seen in the DOM was thought to be either "good" or "very good" by over 67% of the respondents. A few (11%) found that it was "excellent" but some found it "fair" (15%) or "poor" (7%). The quality of the clinical services however, was found to be "very good" to "excellent" (67% and 26% respectively), with only one respondent ranking the quality of clinical services as "good".

While one respondent notes that the DOM at Dalhousie is "one of the best I have had the opportunity to work in", and others note that it is "much better" and "far superior" to that found in FFS departments still others are not so positive about their experiences. "While there is allocated teaching time, it does not mean that the time is used to teach or a requirement that it is used to teach." "Teaching is poor and foregone because of time pressures." "The wait times seem worse now, but it is certainly not because staff are doing more teaching."

The residents also offered their comments on the quality of patient care. One respondent noted that the "quality of patient care is superior under AFP, as is the time devoted to each assessment, thus ensuring more holistic patient care". But, other respondents noted that the "AFP tends to have doctors …seeing fewer patients than they should. Biggest area noticed is small clinic load" and "AFP….does make clinical care less efficient (i.e. fewer patients seen in the same time period)".

The AFP does; however, provide increased opportunity to teach and to improve patient care. "The bottom line becomes delivery of quality medical care instead of income. This is in keeping with the Canada Health Act."

C-4 DEPARTMENT OF HEALTH SENIOR OFFICIALS

Questionnaires were sent to five officials of the Nova Scotia Department of Health and all five were returned. Four of the five respondents agreed that the AFP reflects and supports DOH goals and objectives for the management of specialist physicians' services and that the AFP assists the DOH in the management of specialist services, including teaching and research functions. One respondent, however, disagrees, stating that while the AFP helps in recruitment and retention of specialists, specialists services are "based on DOM wants versus provincial needs". While 80% of respondents also agreed that the DOM AFP assists the DOH in meeting the provincial health goal of improved access to tertiary services, one respondent did note that there is still room for improvements. One respondent did not feel that the AFP assists the DOH in meeting this goal.

The impact the AFP has had on the provision of clinical services by DOM specialists was described as "moderately improved" by 80% of the respondents, with the balance noting "no change". Access to specialists was thought to have "moderately deteriorated" by 60% of the respondents, with 20% finding "no change" and 20% noting a "moderate increase". In terms of the impact the AFP has had on the volume or number of patients seen, 40% have noted a "moderate decrease", with 20% noting "no change" and 20% a "moderate increase". One respondent (20%) was not aware or felt s/he was not able to offer any comment on this question. The impact of the AFP on the quality of clinical care was thought to have improved by all those who responded. 40% believe that the quality of clinical care has "significantly improved", 40% thought that there has been a "moderate improvement", and one respondent chose "not aware".

Three quarters of the four who answered, believe that the triage/wait time/wait list reporting system utilized to manage access to DOM specialists is being used effectively, with one respondent qualifying his/her response by adding: "only in certain divisions". One respondent did not agree, and the fifth respondent did not answer this question. Comments added included:

- "DOM appears to operate as a separate entity";
- "DOH continues to get complaints related to access issues";
- "DOH needs appropriate resources to ensure accountability"; and,
- "there are a number of unknowns which, once articulated may be helpful".

C-5 CDHA SENIOR OFFICIALS

Only one respondent returned the completed questionnaire. The respondent believed that the AFP significantly reflected and supported CDHA's goals and objectives, and assisted CDHA in the management of specialist services for the province and the region. The AFP was seen to contribute to a more appropriate model of care, particularly in the areas of general internal medicine, cardiology, gastroenterology, diabetes care, chronic renal care, and district palliative care services. Access to clinical services was described as being "moderately enhanced" under the AFP, as was volume of patients; whereas quality of care was described as having "significantly improved".

Current access to specialist DOM services was described as "very good" and quality of care as "excellent" The respondent believed that the triage system was not being utilized effectively to manage patient access to DOM services, and that DOM needed to better educate primary are providers regarding its use.

C-6 CDHA NURSE MANAGERS

Questionnaires were sent to 25 nurse managers and 19 (76%) were returned. Thirteen of the respondent group have been associated with the DOM for more than 6 years – from before 1999 and the adoption of the AFP and could thus offer a pre and post-AFP comparison. Nine or 47% of the respondents are familiar with the DOM AFP and almost as many (42%) are partially familiar. Only two or 10% were not familiar with the AFP.

The respondents were evenly split on whether or not they have observed any changes in the overall practice patters of specialist in the DOM AFP since 1999. Eight have and eight have not. Three respondents did not answer this question. Similarly, of the eight who have observed changes, four, or half, feel that the changes have been "positive" and four feel that these changes have been "negative". One respondent noted that the change is variable from physician to physician within the same department/division. While some physicians seem to be available for patient care, teaching and research without negatively impacting one over another, others seem to place a priority on one role to the detriment of another. One nurse manager felt that there is more time for clinical care while another feels that physicians "do not appear to be as involved in patient care". Wait lists are longer than the standard and are accepted as the norm, as patient care is more easily replaced with administrative-type activities. Another respondent noted that some specialists are leaving clinical settings for private practice settings, leaving the remaining physicians over burdened. One respondent, though, pointed out that prior to its implementations, there was fear that the AFP would affect output but this has not been the case.

Most of the respondents (10 of 16 who answered this question) have not observed any changes in the clinical teaching provided by the DOM specialists since 1999. Three of respondents noted that there appears to be more time dedicated to teaching, with one noting that this seems to take time from patient care or availability to the ward.

The majority of the nurse managers were familiar with the DOM triage/wait time/wait list reporting system; however over a quarter of them were not familiar with it. All those who are familiar, however do feel that it is utilized effectively to manage patient access to DOM services.

Most of the respondents have not noted any change in the role of nurses and/or allied health professionals in the DOM under the AFP. Those who have noted a change, commented that the role of nurses has expanded and that nurses and other allied health professionals are taking on more responsibilities. However, while initiatives have been implemented to support physicians, patients are still not getting seen by specialists any faster and if anything, wait lists have been getting longer.

Most of the nurse manager thought that there has been "no change" in either the access to specialists, the number of patients seen or the quality of clinical care provided to patients by DOM physicians. Seventeen of the 19 nurse managers who responded to the questionnaire answered this question. Eight or 42% felt that there has been "no change" in the access to specialists with four noting that there has been a "moderate deterioration" in access and thee noting a "moderate improvement". Conversely, in terms of number of patients seen, five feel that the numbers have "moderately increased", eight note "no change" and two a "moderate decrease". There was more consensus amongst the respondents on the quality of clinical care. Eleven of the seventeen (65%) have noted "no change", two a "moderate deterioration" of quality of care and one each noted a "moderate" and a "significant improvement".

A couple of respondents noted that while there have been changes to quality of care or numbers seen, they are not sure that these changes are the result of the AFP. The role of nurses (and technicians) has expanded. This began in or around the same time as the implementation of the AFP for DOM so it is difficult to pin point a cause and effect. It was noted, however that "… we have implemented many initiatives to support physicians and we are still not getting patients to see specialists any faster, in fact I think wait lists are getting longer." However, another respondent feels that "the team uses data and together works to improve access and services".

C-7 DISTRICT HEALTH AUTHORITY SENIOR OFFICIALS

Questionnaires were sent to the CEOs and Medical Directors of the nine District Health Authorities. Twelve or 67% were returned. All of the respondents are aware that the Department of Medicine had implemented and Alternative Funding Plan. More than two thirds of the respondents (67%) thought that there has been a "moderate deterioration" of clinical service delivery to patients in their District referred to DOM specialists since the AFP was introduced. One respondent, however, felt that there has been a "significant improvement". Three chose "not aware". Patient access to DOM specialists was also thought to have "moderately deteriorated" post-AFP by a number of respondents (42%). A "significant deterioration" was noted by one respondent, two have not noticed any change and one noted a "significant improvement". Three respondents (25%) chose "not aware". The responses to the question regarding how the volume or number of patients seen has changed since the AFP was introduced was even more widely spread. Five respondents (42%) chose "not aware" with one respondent noting a "moderate improvement", two noting "no change", three a "moderate deterioration" and one a "significant deterioration". In terms of changes to the quality of care, the majority of the respondents (58%) felt that there had been "no change" and two thought that there had been improvement (one a "moderate improvement" and one a "significant improvement"). Two were "not aware".

One quarter of the respondents were familiar with the DOM triage/wait time/wait list reporting system and three quarters were not. Tow respondents that were aware of the system felt that it is utilized effectively to manage patient access to DOM services and one did not.

Current access to care within the QEII DOM was ranked as "fair" by five or 42% of the respondents, "good" by three respondents, "very good" by one respondent, and "poor" by one respondent. One respondent added that he/she was "not aware". Eight of the respondents felt the AFP has not assisted their District in attaining its objectives with respect to clinical care and two did. Conversely, the respondents were evenly divided on whether or not the services delivered by DOM physicians are providing the required response for their District.

In summary, it was pointed out that the AFP has established stability in retention of physicians but that we must remain competitive if that is to continue. There have been major improvement and an increase in readiness and engagement of physicians from DOM in District planning and

leadership activities since AFP. However, concern was expressed regarding equal funding for AFPs for similar service and this impact on available human resources. It was pointed out that "before AFP we could contact any sub-specialist of our choice and now we have to refer to the clinic. Waiting time for clinic is much longer." It was also pointed out that an AFP takes away from incentive to work hard.

Another respondent noted that the Division of Cardiology continues to provide excellent service while another noted that delays in access are of particular concern for gastroenterology and rheumatology.

C-8 SENIOR OFFICIALS OF DOCTORS NOVA SCOTIA AND CDHA FAMILY PRACTICE

Questionnaires were sent to senior officials of Doctors Nova Scotia (MSNS) (including the Section of General Practice) and CDHA Family Practice and were asked to comment on feedback they have received from their memberships. All four questionnaires were returned.

Three of the four respondents noted that access to and referral response times of DOM specialists were seen to have "significantly deteriorated" with the introduction of the AFP. The fourth respondent also noted deterioration in access to DOM specialists but only moderately. Similarly, 75% of the respondents report a "significant decrease" and 25% a "moderate decrease" in the volume or number of patients seen. Changes in quality of patient care as a result of the AFP were noted by three of the five respondents. Two noted "no change" and one a "moderate improvement".

Three of the four respondents were familiar with the DOM triage/wait time/wait list reporting system used to manage patient access to specialists and only one of those believed that this system is being effectively utilized.

Half of the respondents have noted from their membership a change in the professional relationship between GPs and specialists since the implementation of the AFP. Half have not.

Half of the respondents note that their membership has reported a change in that specialists are spending more time with patients. Half also noted that AFP specialists are now spending more time in clinical teaching. It was also noted that they are spending more time in other non-clinical activities like research and administration.

C-9 REFERRING PHYSICIANS

Questionnaires were sent out to 70 physicians that have referred patients to DOM specialists. Forty five or 64% returned the questionnaire. 70% of respondents were aware that the DOM has operated under an AFP since 1999. The majority of the physicians surveyed each refer over 26

patients a year to DOM specialists (see methodology sections). 9% refer less than 10 per year and 16% refer between 11 and 25 patients a year.

The majority of the referring physicians feel that access to specialists has been reduced since the AFP has been implemented. A "significant reduction" was noted by 36% of respondents and another 34% noted a "moderate reduction". Only 16% feel that access to specialists has not changed pre and post AFP, with 5% reporting a "moderate improvement". However, 64% of respondents did not see a change in quality of care since the AFP. 23% feel that the quality of care has suffered (7% cite a "significant reduction" in quality of care and 16% not a "moderate reduction"). Only 7% feel that the quality of care has improved ("moderately").

Several respondents pointed out that it is difficult to rate access to care by DOM specialists as it is very much dependent on the Division, although it is thought to be worse in general. Most comments offered regarding the quality of care were very positive; however, the quality of care was almost unanimously qualified by a comment regarding the access or length of time before being seen. A third of the physicians who chose to comment on the access and quality of care pre and post AFP made a reference to the lack of or difficulty in getting "follow-up". Comments ranged from "my patients say that the specialist spends more time with them" to "I'm afraid for my patients admitted to a medical floor".

Current access to specialists in the DOM has been described as "fair" by nearly half of the respondents (48%). 30% describe the access as "poor" with only 18% and 5% describing it as "good" to "very good" respectively. The majority of the respondents, however describe the quality of care currently provided by DOM specialists as good to excellent (36% describe it as "good", 42% as "very good" and 13% rate it as "excellent"). Several respondents (9%); however, did rank the quality of care as only "fair".

40% of the referring physicians were not familiar with the DOM triage wait time/wait list reporting system. Thirty eight of the 44 physicians responded to the question regarding whether or not they believed that their patients are being triaged effectively according to acuity. Of those who responded, 55% felt that their patients were not being triaged effectively and 45% thought that they were.

The respondents were fairly evenly divided regarding whether or not the professional relationship between specialists and primary care providers has changed during the AFP (51% believed it has and 49% not). Comments were offered primarily by those who4 felt the relationship had deteriorated and that it was very poor. Communication and advise is difficult to obtain. Examples of comments include:

- "response varies between collegial to rude and unprofessional";
- "business is not needed, thus communications suffers";
- "specialists are arrogant and condescending";
- "attempts [to correspond] by phone are usually rebuffed";
- "I have no relationship with specialist in Halifax"; and,

- "it is often impossible to speak to consultants to get advise or information. We used to have some professional co-operation, but that is long gone!"

It was pointed out that "there are serious inefficiencies in the hospital that would not be tolerated in a private office of FFS setting" and that "GPs are not part of the system of hospital care in Halifax". "The system with in Capital Health propagates on an "us or them" approach". Comments also centered around the lack of or difficulty in getting follow up for patients. "Consultants are no longer interested in following patients". "Patients are frequently returned to me for follow up with absolutely no communication with me on how to manage them."

In general, the referring physicians were hesitant to make blanket statements regarding the DOM and the questions that were asked as it was reiterated numerous times that the answer/response was dependent on the Division. While some divisions were felt to have reasonable wait times, others were noted as being particularly long to the point that anyone that is really sick is sent to the Emergency Department. Similarly, the quality of care was said to vary widely from division to division. Some divisions were given an excellent rating while others were described as disgraceful bordering on dangerous. Several respondents noted that they tend to use FFS specialists in an effort to circumvent the wait time issue.

A number of respondents noted that they and their staff spend an inordinate amount of time trying to get their patients seen. More and more work is being "downloaded to the family doctors [and they are] left to manage patients longer (sometimes outside our scope of practice) and to deal with them earlier again after discharge by specialists". "The argument that AFP permits more time with patient to improve quality of care is not evident." "The overall impression is that specialists are uninterested in conferring with GPs. They see their research or other interests as taking precedence over providing care to the community directly."

C-10 SPECIALISTS OUTSIDE THE AFP

Questionnaires were sent out to 60 specialists outside the AFP; however nine specialists on the list were screened out as they did not fit the profile as identified. Of the 51 specialists who did fit the desired profile, 35 (69%) returned the questionnaire.

The majority of the respondents (83%) are familiar with the DOM AFP. Twenty respondents answered the question regarding the impact the AFP has had on the delivery of clinical services in their specialty area. 65% of this group thought that the AFP, overall, has had a "negative impact" and 35% thought that there has been a "beneficial impact". Eleven of the thirteen respondents who did not answer the question directly did comment that there has been either no change or a neutral impact. Negative comments primarily concerned longer wait times (noted by 7 respondents). Also noted was a reduction in the quality of consultation, since much of the assessment and reporting tasks were done mainly by residents or nurse practitioners. One

respondent commented that there is decreased physician recruitment in other regions, as competition for specialists has increased.

The volume of clinical services provided by specialists in the DOM was seen to be "inconsistent" by most of the respondents (61%). Only 6% felt that the volume has "increased", and 32 % thought that it has "decreased" under the AFP. Three of the four who did not respond directly to this question noted that they either did not know or had not noticed any change. The fourth respondent who did not respond directly did in fact note an increase, but specified that the only service s/he utilized is Cardiology. Two other respondents who had initially noted an inconsistency in the volume of clinical services have identified Cardiology as having increased, but other specialties have not. Another respondent noted that Nephrology continues to see patients in a timely fashion, but not others and another, felt that services have increased across the board but this is "unlikely due to the DOM AFP". Longer wait times was noted again, as was a "decreased incentive to see clients".

61% of 28 respondents felt that specialists are delivering clinical services differently under the AFP; however only 17 respondents identified in what way. Five respondents identified providing telephone/e-mail consultations; four noted seeing more acute patients and spending more time in clinical teaching, three noted spending more time with patients and only one chose engaging in more disease prevention and health promotion activities. Several respondents noted that more time is being spent doing research and administrative duties to the detriment of patient or clinical duties. One respondent noted "less clinical coverage…", while another noted "more clinic-based consultation and fewer office-based", with yet another noted that DOM specialists are "more available to assist with the care of acute patients". It was noted that the DOM specialists are providing second opinions on the telephone or through video conference, and are more willing to provide the service needed, as opposed to assuming total care control of the patient. However, it was noted that the AFP system of practice is a more complex and impersonal system of care.

Most of the respondents (71%) believe that the utilization of in-patient facilities, out-patient care or use of diagnostic testing has not been affected by the AFP. Five respondents that did not answer this question did clarify that they either did not know or were uncertain. Of those who believe that this area has been affected, put forward the following comments: longer wait times for tests; patients are transferred for short stays for diagnostic work then transferred back for follow-up care; there is less dependence on Halifax for clinical services (as technologies has allowed for high level local care); AFP less keen to work; and, the elimination of all private practice specialists in Halifax [which] reduces access to services.

The specialists outside the AFP were fairly evenly split on whether of not the organization of clinical care delivery has changed under the AFP. 52% thought not and 47% thought that it had. It was noted that there has been an increased use of advanced practice nurses, with clinical care becoming more of a "production line" with much of the assessment being done by non-specialists. A common complaint heard from patients was offered – "they never see the same

specialists more that once and everyone offers them a different opinion on how to best manage their problem".

Most of the respondents (71%) are not familiar with the DOM triage/wait time/wait list reporting system, with all 35 respondents answering this question. Of the 29% who did, 44% thought that it is used effectively to manage patient access and 56% thought it did not. Comments offered made reference to the longer wait lists (seven months, two years).

Two thirds of the respondents (67%) do not think that the professional relationship of specialists to primary care providers has changed under the AFP. Nine of those who did not answer pointed out that they did not know. Of those who thought that the relationship has changed, noted that "primary care physicians are very unhappy as they are left carrying the load for acutely ill and complicated cases, particularly due to patients not admitted to QEII, when they should have been or discharged early in an unstable condition". Another noted that there has always been an underlying gap between family care providers and specialists and the AFP has widened this gap.

The majority of respondents (85% of 26) think that the AFP has not promoted a more integrated approach to clinical services. Those who did not respond commented that they do not know.

The quality of clinical care offered by DOM specialists under the AFP has been described as "excellent" by 9% of the respondents, "very good" by 39%, "good" by 21% and "inconsistent" by 24%. Only 6% rated the quality of care as only "fair". Those who rate the quality of care as "good" or "very good" have noted that it is good in some specialties (Cardiology being mentioned by several), but not so in other specialties – in other words, their comments are more of an inconsistent response. "Sometimes exemplary, but often times limited". Long wait times are stressed by several respondents again. "Once clients are seen….the quality of care is very good. Waiting time to see a specialist is too long."

The majority of the respondents (87%) believe that there has not been an improvement in the quality of clinical services offered by DOM physicians under the AFP. 44% have noted a difference in the practice style and these changes are predominantly negative changes. Comments offered included: less availability; less enthusiasm to see patients; not keen to work hard; more difficult to arrange for consultations; more common to get an answering machine; and, a general tendency to see fewer patients.

Slightly more than half (59%) of the 27 respondents believe that the AFP has been a positive measure to promote clinical service, teaching and research.

Half of the specialists cited the fact that they have not been offered an alternative funding option as the reason for not being having opted for it. Ten have noted professional independence as being the reason and six cited financial reasons.

Benefits of the AFP could be summarized as:

- Time/compensation for teaching (noted by 9 respondents);
- Financial stability (noted by 11);
- Improved recruitment capability (noted by 3);
- Time/compensation for research and administrative activities (noted by 3 each); and,
- Telephone consultation noted by two respondents.

However, several noted that while teaching, research and administration have benefited, the result has been poorer quality of clinical care and more difficulty in getting patients seen.

The major weaknesses of the AFP noted are lack of accountability, and a disincentive to work/see patients. This was noted by at least 13 respondents.

Most of the respondents do not think that the AFP has affected their practice. Some note an increased workload as "I am seeing more and more patients who are dissatisfied with the services provided in the out-patient areas of the QEII mainly because of lack of continuity of care". There are "more referrals from family doctors who cannot access hospital-based services". "I wait more time trying to get hold of consultants and am always being given the 'run-around'". "More clients are going to emergency rooms as it becomes more difficult to be seen by a specialist".

In summary, it was noted that AFP physicians should be monitored for workload to ensure commitments are being kept. It was also noted that when a patient is referred to see a tertiary care specialist, they tend to be seen and reported on by nurse practitioners and medical students with very little care and reporting done by the specialist. They do not take the time to talk and communicate with the patient. Another specialist pointed out that they cannot have part-time hospital affiliations, as this is no longer granted.

C-11 PATIENTS

Questionnaires sent to 985 patients that met the survey criteria. 585 (59%) were returned. 22% of the questionnaires returned were from patients who had been seen by a specialist from the Cardiology Division. 19% had seen a specialist from rheumatology; 12% from neurology; 8.5 % from gastroenterology; 7% each from haematology and nephrology with specialist from general medicine, infectious diseases, oncology, rehabilitation and respirology divisions each being represented by less than 5% of the responding patients.

The majority (58%) of respondents describe the quality of care they have received from their specialist as "excellent", with 22% describing it as "very good" and 15% as "good". Less than 4% of the respondents rated their care as "fair" or "poor".

78% of the respondents noted that they have not observed any changes since 2000 in the quality of care that they have received. Of the 12%, or 70 respondents, who did specify a change, 20

noted a positive change and commented primarily on the quality of care and that the specialist is spending more time with them. However; 24 respondents noted longer wait times and that the specialist was too rushed or had less time for the patient. A couple of respondents noted that when their specialist retired or left the province, they were not transferred to another specialist. The balance of the respondents who noted a change did not offer comments or their comments were not specific to the quality of service provided.

Two thirds of the respondents noted "no change in wait time" to describe the length of time they had to wait to see their specialist during the past four years. 14% felt that there are "longer wait times" and 10% felt that the wait times are shorter.

The majority (70%) of the respondents feel that there has been no change in the amount of time that their specialist spends per visit over the past four years. 9% felt that they were seen for a longer period of time per visit and 10% felt that the time per visit was less.

In response to a question regarding the advice and information that their specialist provides during a visit: 39% identified advice on "diet"; 45% identified "exercise"; 45% identified "lifestyle"; and, 65% identified "drugs".

The general comments offered were very similar to those offered in response to the question regarding changes in the quality of care. Overall, the comments were very positive. Over 250 respondents found the quality of their care as "excellent" and commented very favourably regarding their doctor's care and compassion. However, over 60 respondents offered comments that were not favourable regarding the services they had received. A few of the 'areas' that were identified as needing changes were: "waiting for a referral from a family doctor …if already going to a specialist"; "need a doctor who is not so busy doing other things outside of patient care"; "..usually see the doctor whose turn it is to man the clinic"; "doctor doesn't listen and rushes me out of the office"; and, "never given a follow-up".