

first
national report
on health sector
performance
indicators

'public hospitals – the state of play'

FEBRUARY 1996

A REPORT OF THE NATIONAL HEALTH MINISTERS' BENCHMARKING WORKING GROUP
TO THE AUSTRALIAN HEALTH MINISTERS' CONFERENCE

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FOREWORD

Developing benchmarks for health sector performance is a difficult but intriguing task with which to be charged.

It is difficult because the health industry encompasses a broad range of health care facilities, health programs, and administrative and financing arrangements.

At the same time it is an intriguing task because a succinct set of national health sector benchmarks which allows comparison of performance between states has not previously existed. The ability to make meaningful performance comparisons will form a significant component of best practice developments.

The National Health Ministers' Benchmarking Working Group was charged with this task by the Australian Health Ministers' Conference. The Working Group has made significant progress in developing a framework for the measurement of effectiveness, efficiency and equity in the acute health sector, and definitions for performance indicators within this framework which are nationally applicable.

Consistent national data are not yet available for some of the new indicators, but nonetheless, there are sufficient results to date to stimulate questions as to why differences occur among jurisdictions. It is through asking these questions that the health industry will learn further ways of improving the management processes and clinical pathways which contribute to outcomes in this sector.

For much of the early work of the Working Group, Mr Chris Sheedy, Assistant Secretary, Health Service Outcomes Branch of the Department of Human Services and Health, was the Chair of the Working Group and I would like to thank him for his significant contribution.

Finally, it is with pleasure I present this report to the Australian Health Ministers' Conference, and recommend its use in the Australian health industry.

Bob Wells

Chair

National Health Ministers'
Benchmarking Working Group

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PREFACE

This document represents the efforts of the National Health Ministers' Benchmarking Working Group to develop a set of performance indicators for the health sector, and to bring together national data for the purpose of reporting against these indicators. The Australian Institute of Health and Welfare was contracted to provide technical assistance to the Working Group and to prepare this report.

While considerable progress has been made in developing and reporting health sector performance indicators, problems still exist in the quality and comparability of much of the data presented in this report. These problems are discussed throughout the report and readers are urged to exercise caution in interpreting the results.

Results are highlighted in the text with a solid vertical bar at the column margin. The reporting and discussion of the performance indicators appears in the coloured section in the middle of the document.

Acknowledgments

I am grateful to the many organisations and people who contributed to this report, and acknowledge firstly the members of the Working Group whose energy, commitment and liaison skills enabled the production of the report.

Secondly, I would like to thank the officers of the State and Territory health authorities who provided the Institute with data, as well as many sections of the Commonwealth Department of Human Services and Health which provided input. In particular, I acknowledge the assistance of the Hospitals Strategies Section which provides secretariat services to the Working Group and coordinated many aspects of the report preparation.

Within the Institute I received invaluable assistance from staff in the Health Services Division, particularly Anne Broadbent and Susan Salloom, in the preparation of data. I am also grateful to Chris Stevenson who provided technical advice regarding the analysis of intervention rates. Finally, I would like to acknowledge the efforts of the Publications Unit in managing the publication of this report within a tight timeframe.

Mark Cooper-Stanbury
Senior Project Officer
Australian Institute of Health and Welfare

ABBREVIATIONS

–	Nil or rounded to zero
ABS	Australian Bureau of Statistics
ACHS	Australian Council on Healthcare Standards
AHMAC	Australian Health Ministers' Advisory Council
AHMC	Australian Health Ministers' Conference
AIHW	Australian Institute of Health and Welfare
ALOS	Average length of stay
AMC	Australian Manufacturing Council
AN-DRG	Australian National-Diagnosis Related Groups
COAG	Council of Australian Governments
DRV	Depreciated replacement value
HACC	Home and Community Care Program
HASAC	Health and Allied Services Advisory Council
HEDIS	Health Plan Employer Data and Information Set
HSH	Commonwealth Department of Human Services and Health
HUCS	Hospital utilisation and costs study
ICD-9-CM	International Classification of Diseases, 9th Revision, Clinical Modification
IFRAC	Inpatient fraction
MBS	Medicare Benefits Schedule
na	Not applicable
NHDD	National Health Data Dictionary
NHMBWG	National Health Ministers' Benchmarking Working Group
NHOP	National Hospital Outcomes Program
NHQMP	National Hospital Quality Management Program
NMDS	National Minimum Data Set
np	Not provided
OECD	Organisation for Economic Cooperation and Development
PBS	Pharmaceutical Benefits Scheme
TRV	Total replacement value
US	United States of America
VMO	Visiting medical officer

SUMMARY

1. Australia, like other developed countries, is faced with the issues of rising health care costs, rising demands for health care services, and greater consumer expectation of quality and improved health outcome.

Achieving efficiency gains is an appropriate response to these pressures, but this must be done without compromising effectiveness. To monitor efficiency and effectiveness, performance indicators have been developed that measure key processes and outputs in health service delivery. These indicators assist governments, funders and managers of health services in management and policy development. Specifically, they provide baseline data and enable the setting and monitoring of best practice levels of performance.

2. The process of systematically searching for and incorporating international best practice into an organisation is known as benchmarking, and is common practice among leaders in other industries. This report represents the efforts of the National Health Ministers' Benchmarking Working Group, a working group of Commonwealth, State and Territory health authority officers, the Australian Hospitals Association and the Australian Institute of Health and Welfare. The Working Group was established in March 1994 by the Australian Health Ministers' Conference to develop health sector benchmarks.
3. The Working Group developed a set of hospital performance indicators in the areas of efficiency, productivity, quality and access. These indicators were developed in the light of current national collections and, for some measures, in liaison with other working groups and programs. The scope was limited to acute hospitals for this report, with extension to other areas of the industry possible in the future.
4. To put the hospital results in context, data are presented on a range of institutional and non-institutional health services, and a sketch of the demography of the Australian population is provided. Key contextual data include:
 - expenditure in the acute hospital sector amounted to just over \$12 billion, with the entire health system contributing 8.5% to Australia's gross domestic product in 1993–94;
 - there were 1,130 acute health care facilities supplying 4.2 beds per 1,000 population; and
 - on average, each person received 10.2 medical services through the year.
5. The main part of this report (Chapter 3) defines and reports on the hospital performance indicators developed to date. The Working Group found that the quality of available data was highly variable, and in only a few cases were collected data based on nationally consistent definitions. For these reasons, results in this chapter should be interpreted with caution.

6. The main findings in the area of efficiency for public hospitals were:
 - the average cost per casemix-adjusted separation ranged from \$2,208 in South Australia to \$3,237 in the Australian Capital Territory, with the national average being \$2,327 (Table 3.2); and
 - there was a high degree of consistency in average length of stay among the States and Territories for the top 20 treatment categories reported (Tables 3.4 and 3.5).
7. In the area of productivity, indicative data were provided though results can not be directly compared.
8. In the area of quality:
 - data relating to quality of care indicators are reproduced from a report of the Australian Council on Healthcare Standards (ACHS) Care Evaluation Program. These data are based on a small, non-representative sample of hospitals in each State and Territory:
 - the rate of unplanned readmissions ranged from 0.8% in the Australian Capital Territory to 6.3% in the Northern Territory (Table 3.9);
 - the rate of return to operating room ranged from 0.1% in Tasmania to 4.2% in the Northern Territory (Table 3.10);
 - the rate of hospital-acquired bacteraemia ranged from 0.03% in South Australia to 0.3% in Tasmania (Table 3.11); and
 - as a stand-in measure for the quality of the processes of care, the number of hospital facilities accredited by ACHS is reported: the proportion of public and private acute hospitals accredited ranged from 16% in Queensland to 64% in New South Wales (Table 3.16).
9. The main findings in the area of access were:
 - the average clearance time for elective surgery patients ranged from 1.8 months in New South Wales to 9.9 months in the Northern Territory (Table 3.18). Clearance time is a prospective measure of the capacity of the system to clear patients from the waiting list;
 - there were large variations among the States and Territories in the separation rates for selected procedures (Table 3.23). The largest percentage difference above the comparison rate was for hip replacements in the Australian Capital Territory (72.8%), while the largest difference below the comparison rate was for lens insertions in Western Australia (43.7% below);
 - total admissions per 1,000 population ranged from 226.5 in the Australian Capital Territory to 283.4 in South Australia (Table 3.24); and
 - for public acute hospitals, the highest rate of public patient admissions was in the Northern Territory (91%) and the lowest in New South Wales (72%).

10. The Working Group developed an agenda for developing indicators and establishing benchmarking practices in the health sector. In summary, four areas of development are discussed with possible timeframes indicated:
- improve indicators reported in this first national report (12 months);
 - develop agreed indicators not reported in first report (18–24 months);
 - extend the set of agreed indicators to cover all components of the framework, such as outcomes and locational disadvantage (18–24 months); and
 - other activities, including facilitation of benchmarking networks, investigation of indicators to cover the continuum of hospital and non-hospital components of care, and investigation of options for international networks (18–36 months).