

The change agent

STORY **MELISSA SWEET** • MAIN PHOTO **ANDREW MATHIESON**

It's not only patients who have to make difficult changes in response to the growing diabetes burden. Rural and remote doctors are also rising to the challenge of managing this chronic illness.

When diagnosed with diabetes about 20 years ago, Dorothy Butler knew she would have to make some big changes if she wanted to be around for her 50th birthday.

She quit a three-pack-a-day habit, cut back on the grog, and put her sweet tooth on a strict leash.

Now 57, Ms Butler continues to work hard at maintaining a healthy lifestyle to help control the type two diabetes that runs in her family.

She hopes to eventually reduce her dependence on insulin injections. "You've got to make the changes if you want to survive," she says.

Ms Butler counts herself as lucky. She had the know-how and capacity to make changes to her lifestyle, but every day is reminded that many other Indigenous Australians are not so fortunate.

Through her work she sees the terrible toll of diabetes: the amputations, blindness, infections and premature deaths of people who should be in the prime of their lives.

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Seeing the toll of diabetes from both sides: eye health co-ordinator for the Katherine district, Ms Dorothy Butler.

taking retinal screening across 22 communities.

In the past few years, she's noticed that younger and younger people are being diagnosed with diabetes. Ten years ago, new patients were typically in their 40s; now it is not uncommon for them to be in their 20s and 30s or even teens.

The growing burden of diabetes may be most pronounced in Indigenous Australians, where it is thought to affect up to 30% of people in some areas¹, but it is also creating challenges for the broader community.

For health services and professionals, there is a growing awareness that their traditional orientation towards acute health care does not equip them well to respond to the needs of patients with chronic conditions.

Dr Christine Connors, a GP and public health physician who heads the preventable chronic disease program in the NT Health and Community Services Department, has been at the forefront of efforts to reorient the health system towards chronic care.

This has involved developing a more systematic approach to diagnosing and managing diabetes and other chronic diseases, through the use of disease registers, patient recall systems, standard guidelines, care plans and auditing of care at

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After 30 years as an enrolled nurse in the NT, Ms Butler retrained several years ago as an Aboriginal health worker, and is now the eye health co-ordinator for Katherine district, based at Wurliwurlinjang Aboriginal Health Service. She spends much of her time on the road, under-

†8 out of 10 patients achieve their LDL-C goal with CRESTOR 10 mg, in studies using ATP III goals: high risk <2.6 mmol/L; medium risk <3.4 mmol/L; low risk <4.1 mmol/L.¹⁻⁶ NHTA LDL-C goal is <2.5 mmol/L. CRESTOR has a positive effect on HDL-C which is maintained across the dose range.^{1,7}

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both the clinical and organisational levels.

Dr Connors says the changes can be difficult and confronting for both patients and health professionals. "It's a whole new way of thinking about how you work," she says. "Unfortunately it's still not the stuff that we're taught at medical schools. We mostly think and practise within an acute paradigm.

"We're the experts and say, 'This is your problem, I'll fix you'. The patients can be passive. We fix them and they go on their way."

By contrast, Dr Connors says, effective chronic care involves screening of patients who might otherwise have not realised they had a health problem and requires a team of health professionals and patients working together over the long term.

"We can't cure them, and that sets up a huge amount of frustration for health staff as well as our patients," she says. "We try to tell them what to do, which is what we're used to doing for an acute illness, and it doesn't work."

When doctors start to think differently about their role, their frustration often resolves, Dr Connors says. "Once you start recognising the chronic illness paradigm and think about working with the person, you stop being frustrated because

your role is to give them sufficient practical advice and support that enables them to manage their illness to the best of their ability."

But just as simply telling patients to change their lifestyle is unlikely to be effective, it's also unhelpful simply to tell doctors and other health professionals to change their ways, Dr Connors adds. They need systems to support changes in their clinical and practice behaviour.

Dr Connors has been involved in developing and implementing such an initiative in the NT, the Audit and Best Practice for Chronic Disease (ABCD) project, a tool for health services to examine the systems they have in place to support good diabetes care.

"Many health professionals, and this is right across Australia, don't recognise the importance of systems to promote good clinical behaviour," she says. "It's only when they start to look at their systems that they realise the gaps that stop them ensuring everyone is offered brief interventions, or that they don't have a way of flagging that a patient who has come into the clinic today is overdue for a routine diabetes check."

An ABCD audit of 12 Aboriginal community health centres has produced mixed findings about standards of diabetes care. While an average of

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DR CHRISTINE CONNORS



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Dr Evan Ackermann: "There is now good evidence to support structured care for chronic disease management".



Bruce Miller

**"I'm not saying we're perfect but this is what a rural practice can do."
DR EVAN ACKERMANN**



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63% of patients had recommended blood pressure checks, only 20% had recommended foot checks and about two-thirds had not been counselled on diet, activity, smoking, alcohol or diabetes medications.²

Dr Connors says recent figures showing improvements in chronic disease mortality among Aboriginal people in the NT suggest that taking a more systematic approach to care can pay dividends relatively quickly.³

One of the few certainties of life is that efforts to create change will meet resistance. When Dr Evan Ackermann began encouraging colleagues to make changes to their practice at Warwick, in south-east Queensland, he found that persistence was required.

The effort required to introduce a structured care program – which included implementing new practice systems, learning new computer skills and developing closer working relationships with allied health professionals – were daunting for doctors who already felt overloaded.

Dr Ackermann says it took a number of meetings before his colleagues came on board. Some patients were also initially hesitant about being recalled for appointments. "They were a little bit resistant," he says. "Now it's the other way round – if we don't recall them on time, they're pushing to come in."

Since 2002, the Condamine Medical Centre, which has 10 GPs and five nurses, with a part-time diabetic educator and a dietitian funded by the local division of general practice, has had systems to support care planning, regular recall and multidisciplinary review. More than 700 patients are on its diabetes register.

All care by the doctor, nurse, dietitian and diabetes educator is provided under the one roof, using one medical record. Patients are recalled every three months for assessment, and practice nurses undertake structured measurement of known risk factors before patients see the doctor. No attempt has been made to introduce standardised medical management.

The changes appear to have paid off in improved patient outcomes. An audit of the first 404 patients with type 2 diabetes, reported in the *Medical Journal of Australia*, found many diabetic and cardiovascular risk factors had improved from baseline measurements. The greatest gains were seen in patients at highest cardiovascular risk.⁴

Dr Ackermann's advice to other practices wanting to implement a similar approach is to use IT to automate as many systems as possible, to locate all health professionals under the one roof, and to maximise the role of the nurses.

The program's success, which has been recognised by awards from the town and RACGP, has the practice wanting to introduce a similar

approach for all chronic diseases.

"I'm not saying we're perfect but this is what a rural practice can do," Dr Ackermann says. "Rural practices have a history for being innovative and using opportunities that come along. There is now good evidence to support structured care for chronic disease management and I would encourage others to make the leap and change."

Many experts believe, however, that diabetes is likely to continue to exert a rising toll, no matter how great the improvements in health care. The history of public health suggests that the biggest inroads in preventing and managing the so-called "diabesity" epidemic will come from social and environmental changes to make it easier for people to be more active, eat better and lose weight.

At Port Lincoln in SA, Dr Richard Watts has been involved in many clinical trials aimed at improving diabetes care. He is encouraged that it is often difficult to find patients with poorly controlled diabetes to be involved in such trials but it can be difficult to persuade patients to make lasting lifestyle changes.

"We have the medical arsenal to control diabetes, but a lot of it comes down to compliance and lifestyle factors, and it's those factors which

seem to impact on the complications," he says. "Often it feels like I'm doing the bandaid work, that it's difficult to get to the root cause of the problem."

On his wish list for improving diabetes prevention and control are better food labelling systems and greater government investment in measures to promote physical activity.

Meanwhile, back at Wurliwurlinjang in Katherine, Dorothy Butler is also painfully conscious of how difficult it can be for those at greatest risk of diabetes or related complications to follow a healthy lifestyle.

Diabetes, she says, is just one aspect of a much broader societal and environmental problem. "There's the lifestyle, the drinking, the smoking – it all comes together."

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Port Lincoln GP Dr Richard Watts: "We have the medical arsenal to control diabetes, but a lot of it comes down to lifestyle and compliance factors."

Where the patient is part of the team

The key to improving diabetes care at one rural practice in NSW has been to forge a team where everyone – from the patient, to the receptionist, allied health professional and GP – knows what is expected of them.

Dr Ayman Shenouda and his wife Dr Samiha Azab opened their practice in Wagga Wagga in 2005, and set up a system to support chronic disease management.

When patients are diagnosed with diabetes at their practice, they receive a laminated card setting out what they can expect to happen during their nine visits each year.

At each visit, the practice's computer programs prompt the GP, diabetes educator, dietitian or podiatrist on what checks and other care should be provided.

Patients are given a folder, which has information about diet, exercise and diabetes, as well as a chart, which tracks their progress on indicators such as weight, blood sugar

and blood pressure. "We really concentrate on patients facing the problems too; it's not only us telling them what to do," Dr Shenouda says.

"There is no doubt by educating patients and letting them know more about their disease we achieve better outcomes."

Dr Shenouda acknowledges that he and his wife have been fortunate to

be able to design a practice from scratch, with the facilities and systems to support chronic disease management, rather than having to introduce changes to an established practice.

"I could see where the government was coming from with the incentive payment to change management of chronic diseases and also the use of

information management to help deliver better outcomes, so when I built my practice, I put all of that into it," he says.

He also recognised that many GPs and allied health professionals were working in isolation from each other, and wanted to create an environment that promoted team work.

The systematic approach, which also includes opportunistic screening of new patients older than 45, a diabetic register and recall system, has paid off in improved diabetic control.

Dr Shenouda says 63% of the practice's diabetic patients have HbA1c values below 7%, compared with a national average of about 30 per cent.

Optimum use of effective computer programs is critical to improving diabetes management, Dr Shenouda says, but it is also one of the major obstacles. "A lot of doctors do not know how to use Medical Director to full capacity," he says.



Dr Ayman Shenouda, with his wife Dr Samiha Azab, in their Wagga Wagga practice: "We really concentrate on patients facing the problems too; it's not just telling them what to do."

Overhauling Swan Hill's approach to diabetes: Dr Ernan Hession and his wife Paula, a diabetes educator.

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A template for improving

When public health experts talk about diabetes, there is often alarm in their voices as they warn of a huge problem that is only going to worsen.

But when Dr Ernan Hession, a GP at Swan Hill in northern Victoria, speaks about diabetes, there is more than a hint of quiet satisfaction that the town's general practice has been able to overhaul its approach to diabetes.

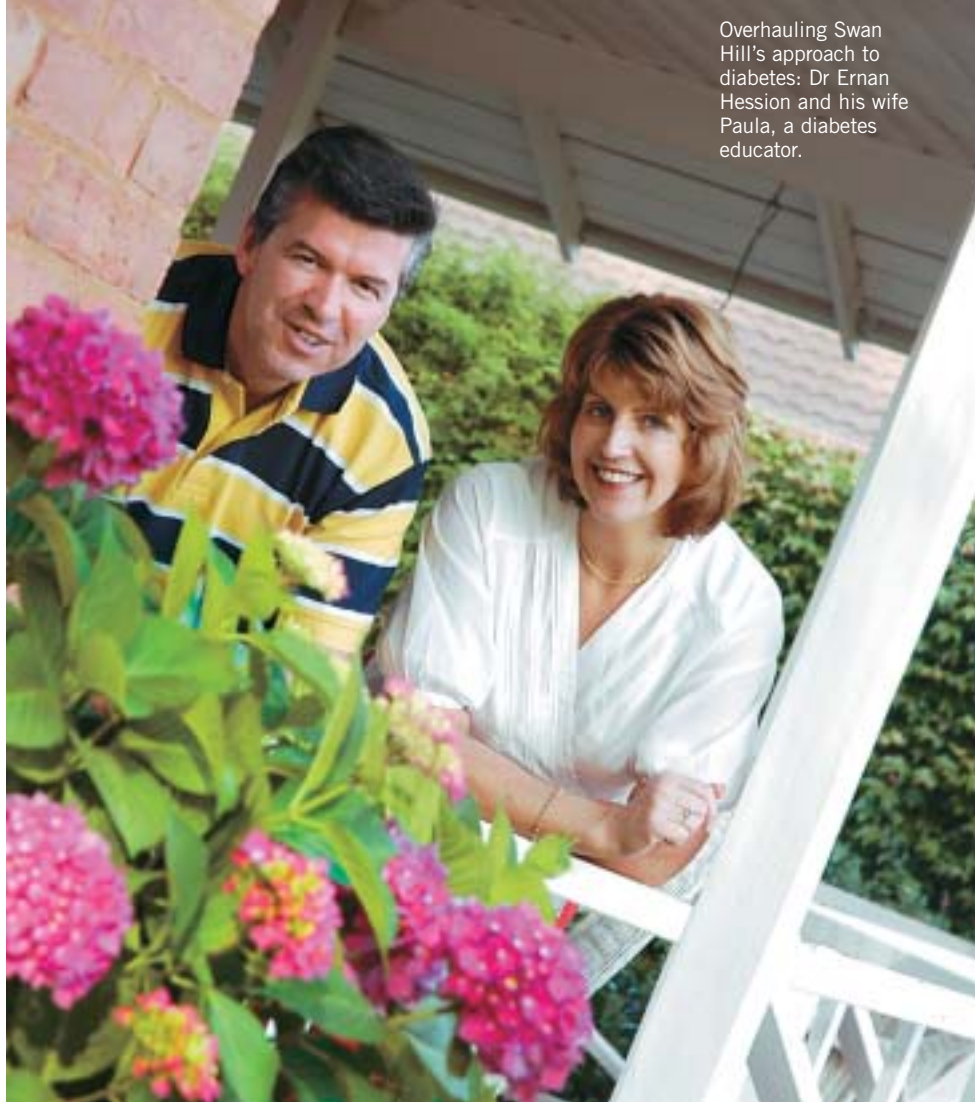
"It's been very gratifying over the past few years to move from a rather haphazard approach to managing diabetes to an extremely organised approach, which is really improving the care of our local population," he says.

"The difference it's made for patients is significant. In terms of good diabetes control, including blood pressure, weight, exercise as well as blood sugars, we can see a significant improvement in a majority of patients."

The key drivers for the 11-doctor practice to make changes were Federal Government incentives to develop care plans and an awareness of a rising diabetes caseload. Another factor was the input of British doctors working at the practice who were surprised it didn't have a diabetes clinic.

"Diabetes is an area where I think the government's care plan has been extremely important," Dr Hession says. "If used properly, it does remunerate the doctor appropriately

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patient outcomes

and encourages a team approach to management and allows the patients to become more involved in their own management.”

With no physicians in town, most of the 600 diabetics on the practice books are managed locally. A care plan is generated for all newly diagnosed patients, with a recall system to ensure they are reviewed at least once a year. A diabetes clinic is held every fortnight, staffed by a podiatrist, dietitian, GP and diabetes educator. The allied health professionals are employed by the local hospital and the practice provides free clinic facilities and administrative support.

In 2005, Dr Hession did a correspondence course through Monash University, which he says has given him a more holistic approach to managing diabetes, including increased awareness of the importance of reducing cardiovascular risk.

“It really focused me on the management of type two diabetes in particular, and the fact that diabetes is a multi-system disease which requires management of all the other variables, which I hadn’t fully appreciated before.”

A key member of the practice team is the diabetes educator, Paula Hession, who shares her husband’s pas-

sion for improving care. Her interest in the area developed when she moved into primary care nursing a few years ago after a long career in acute care.

“I realised that many of the clients were very lost about how they could self-manage at home,” she says. “They weren’t really aware of how to manage hypoglycaemia and to make sure they had rotation of sites for injection techniques. They also needed more help managing the lifestyle issues.”

Ms Hession did a diabetes educator course through Deakin University. She now sees 15-20 patients a week, produces a diabetes newsletter for colleagues, and is active in health promotion with local primary schools.

This year, she expects to become credentialled with the Australian Diabetic Educators Association, which will give her a provider number and allow her to practise independently under Medicare.


Dr Hession believes other practices of a similar size could benefit from encouraging at least one of their practice nurses to do a diabetes educators course and become credentialled. “What we run here is really an excellent template for what could be adopted elsewhere,” he says. ●



Paula Hession: many patients need more education to self-manage their diabetes.

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