OPTOMETRY

PROFILE

Jonathan Nathan DSc Educator, clinician and research leader

'What's optometry?' was my question during a chance encounter with Jonathan Nathan over half a century ago. He was docking his yacht at the Sandringham jetty on Port Phillip Bay on a Summer day in 1947 when I happened to be nearby. I took a line and secured it. John and I had been to school together; several years had passed and our paths had not crossed in that time. He asked the usual sort of question in those encounters, 'What are you doing these days?'

At that time, I was studying science at The University of Melbourne. John eloquently proceeded to convince me that optometry offered more than a career in science. Even then, he was a great advocate for optometry and it was through his persuasion that I became an optometry student. He had convinced me by unfolding a concept of optometry that went beyond the reality of the time, when the selling of spectacles was the popular image of our profession and sight testing was free and often not much more than the necessary precursor to the sale. His was a dream of a true profession with a university-based teaching school, with its own body of research and with a strong ethic of dedication to serving the community. Little did I know at the time how much he would do to bring that dream to fruition.

Perhaps John Nathan did not change optometry single-handedly, but by his example in practice and his leadership and personal dedication to optometric education, he was one of the most important catalysts.

His professional career, which was to be



Portrait of John Nathan, by Mark Scurrie, commissioned in 1978 on completion of his nine-year term as President of the Victorian College of Optometry

so important for Australian optometry, began in 1944 when he completed the diploma of the Licentiate of Optometric Science (LOSc) with honours from the then fledgling Australian College of Optometry, later to become the Victorian College of Optometry. Even then, he was recognised as an outstanding scholar: the *Australasian Journal of Optometry*, the precursor of this journal, gave a page, including a photograph, to report his academic achievements under the heading 'A brilliant student'.¹

It was symbolic of a new era for the profession that the person who was later to do so much for optometric education and research was among the first diplomates of the new course in optometry provided by the college. The LOSc diploma he received was one of the first three awarded by the college, which had been established just four years earlier. His fellow students were Douglas Allen and Anthony Douglas. The new course replaced the Fellowship Diploma of the Victorian Optical Association. It was a four-year full-time course, in which the first year comprised university science subjects. In the second and third years of the course, anatomy, physiology, biochemistry and other biomedical subjects were taught by the university.

John Nathan completed a BSc at The University of Melbourne in the year after he completed his optometry diploma and he obtained first class honours in physiology and chemistry. He was able to complete a science degree in one further year because the new optometry course he had done included two years of study of science subjects.

A mere three years after qualifying as an optometrist, he was appointed as Director of the Clinic of the College. In 1950, at the age of 26, he was appointed Director of Studies, a post that he held for the next 14 years. This was not a fulltime academic appointment with a handsome salary. It was an honorary appointment for which the only remuneration was casual payment for lectures and clinical supervision. During these 14 years as Director of Studies, John was in the fulltime practice of optometry.

The foundations he laid as Director of Studies enabled the course to become a degree course in The University of Melbourne. The content and quality of the course were the essential criteria for the optometry course to be adopted by the university in 1960 as a degree course. This was the second degree course in optometry in Australia; the University of New South Wales had established a degree course in optometry several years earlier.

John Nathan's scientific credibility and his eloquence and quiet sincerity in arguing his profession's case played a pivotal part in bringing the negotiations with The University of Melbourne to a quick and successful conclusion. The quick acceptance of optometry as a degree course of the university was helped by the university having just established a Faculty of Applied Science specifically for vocational courses based in science. However, the fact that the new degree course differed so little from the diploma course it replaced was testimony to the standards John Nathan had set as Director of Studies.

It was clear early in the negotiations with the university that optometry needed a research base to satisfy a university's traditional role of adding to the community's fund of knowledge. John Nathan said to Barry Cole, then the only full-time member of the academic staff of the college, and to Geoff Henry,^a the Chairman of the College Council, 'Now that we are in the university we have do some research.'

These three embarked on two research

projects investigating abnormal colour vision, one on the characteristics and inheritance of tritanopia and the other on the handicap of abnormal colour vision in driving. They did this work in the evenings because John and Geoff were in full time practice and Barry carried onerous teaching duties in the college but they worked effectively. Their research resulted in the publication of several papers in prestigious journals^{2,3,4} and established the ground for the strong research ethos in the Melbourne school of optometry, which continues to this day. These were among the first research papers from Australian optometry to be published in international refereed journals. They also obtained the first research grants for the college, which came from the Australian Road Research Board.

John Nathan and his two co-workers submitted different aspects of their collaborative research for a higher degree and in 1965, at the same graduation ceremony, they were each admitted to the degree of Master of Applied Science. These were the first higher degrees in optometry at The University of Melbourne.

John Nathan stepped back from active involvement in research when these initial research projects were concluded and the college's research activities were being vigorously pursued by others, but he never gave up thinking about what he did in the consulting room and what he read in the literature. He noted the emerging research into the aetiology of myopia and in particular the early work of Josh Wallman in the City University of New York, which showed how myopia could be produced by visual deprivation. John felt that optometry had to be involved in researching refractive errors because that was, after all, one of our prime interests. He felt that this fascinating work should not be left solely to biologists.

The National Vision Research Institute had been established by the Victorian College of Optometry in the 1970s and was pursuing exciting work on post-natal visual development under the leadership of Dr Donald Mitchell and Dr Jack Pettigrew. John Nathan persuaded Dr David Crewther, Dr Sheila Crewther and Dr Patricia Kiely, research fellows in the NVRI at the time, to start work on experimental myopia. They set up an animal colony at LaTrobe University and contributed to the myopia debate. They also used the monkey colony to study the effects of extended wear contact lenses on the cornea.⁵ John Nathan's most enlightening contribution to the myopia debate may be his study of the relationship between disease-related visual deprivation and refractive error,⁶⁻⁷ which is a clever study of the effects of visual deprivation using human subjects drawn from the patient base at the Kooyong Low Vision Clinic.

The scope of John Nathan's contribution to optometry has been formally recognised by all of the bodies in Victoria involved in the teaching, research and administration of his profession.

In 1965, he was awarded honorary Life Membership of the Victorian College of Optometry. He served the college as a Councillor for 30 years and was President of the college from 1970 to 1978. Prior to this term as President, he was Vice President and Chairman of the Council for two years, in 1968 and 1969, when Professor Sir Arthur Amies was the titular President of the College.

His true talents lay beyond administrative leadership in councils and committees. As Director of Studies for 14 years, he shaped the modern optometry course in Melbourne and as a part-time lecturer and senior clinical tutor for nearly four decades, he profoundly influenced generations of students.

John Nathan was a very good clinical teacher because he was a superb clinical optometrist, who practised according to the highest ethical and professional standards. In his practice of more than 50 years, he was a role model for several generations of young optometrists. The quality of his professional work and his quietly gracious and friendly nature gained the respect and lifetime loyalty of his patients. His peers in both optometry and ophthalmology held John in the highest regard for his professional skills and his integrity.

His contributions as an educational and professional leader were recognised by the

a. Geoff Henry had completed a BSc degree in physiology with first class honours before doing optometry, so he had the science credentials to be part of this new research endeavour. He also had the talent because he was later to abandon private practice of optometry in favour of a fulltime research career in the John Curtin School of Medical Research in the Australian National University. There he became a Senior Research Fellow and ultimately Head of the Vision Research Centre.

Victorian Division of Optometrists Association Australia by the award of honorary life membership of the association in 1970. In 1994, The University of Melbourne recognised his contributions to scholarship and education by the award of Doctor of Science *Honorus Causa*. This rarely-bestowed honour was conferred to mark his contributions to science and is a fitting tribute to a remarkable career. John's contribution is also recognised by his continuing appointment within the Department of Optometry and Vision Sciences as a Principal Clinical Fellow with title of Associate Professor.

John's sustained commitment to the advancement of his profession can be understood, at least in part, by knowing his parents. His father Bertram was a gentleman in the true, if old fashioned, meaning of this term. Like his son, Bertram Nathan was an optometrist of uncommon skill and dedication who also contributed to the growth of his profession. He was the first Chairman of the Optometrists Registration Board, when it was established by the enactment of the Registration Act in Victoria in 1935. He was a Councillor of the College in its early years and its Treasurer in 1955 and 1956, during which time he secured government grants for optometric education for the first time. He too had a vision of what optometry could become and was a hugely effective contributor to its early growth. John's mother was a gentle, highly intelligent woman, perfectly adapted to nurture the characteristics that we recognise in her son.

In his retirement, John pursues his very long-term hobby of painting. He combines a natural talent with skill and imagination just as he did in his professional activities. His paintings express something beyond the ordinary vision, just as did his dream for optometry.

How fortunate is optometry that we have attracted such a man to our fold? John Nathan could have succeeded in almost any career of his choosing; what a loss it would have been to optometry if he had chosen another profession. We whom John has served so well can but hope that he feels that his chosen profession has given him the satisfaction he deserves.

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