

optovision

Canadian Journal of Optometry
Vol. 48 No. 2



Revue Canadienne d'Optométrie
June/juin 1986



Imperial Optical Canada

Digilab 750 Automated Perimeter with IBM Personal Computer

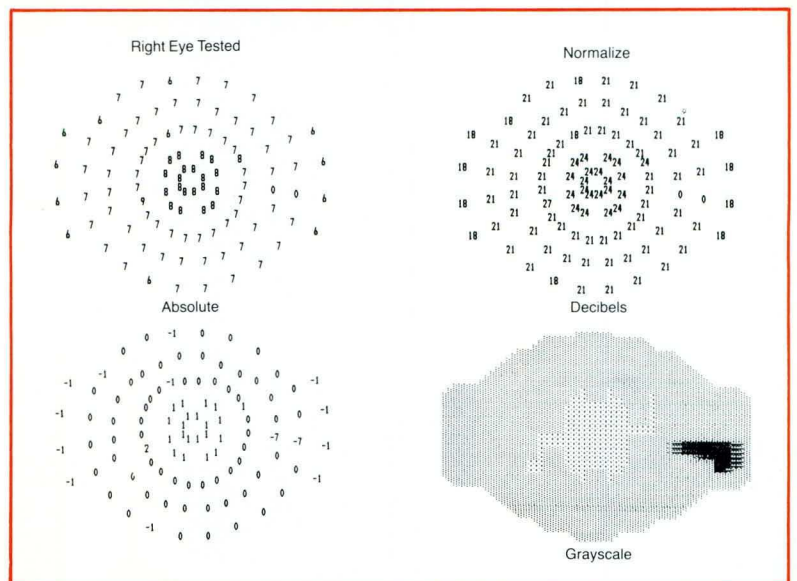
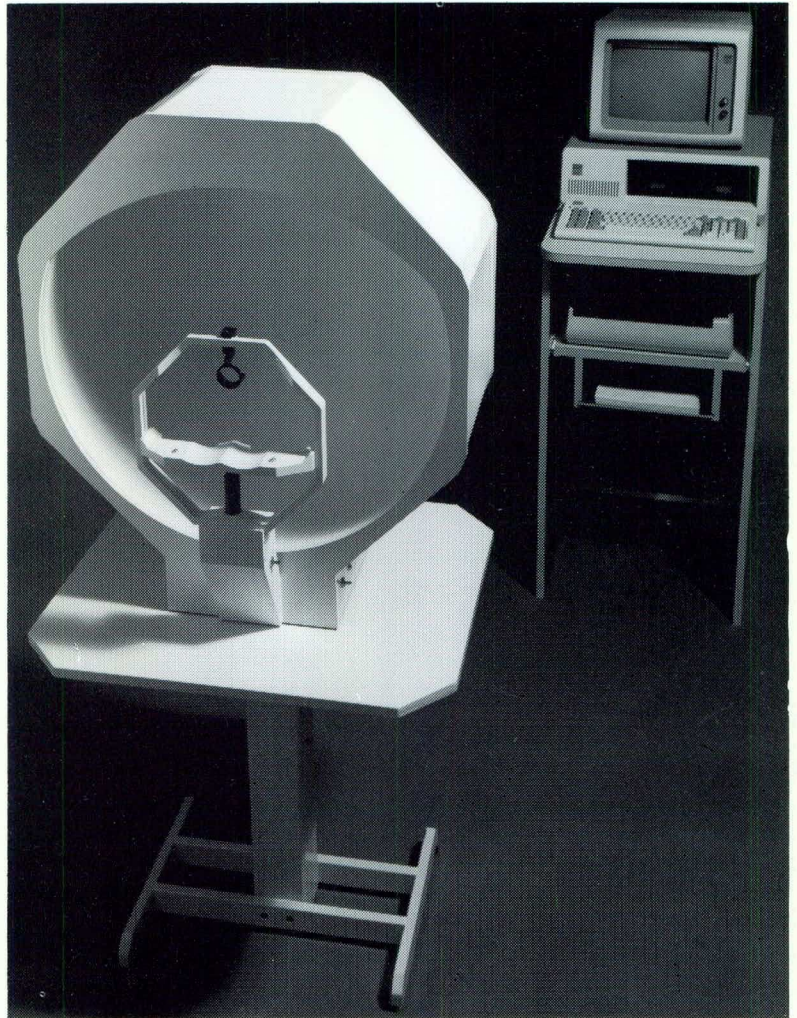
Heijl-Krakau Based Testing Strategies and Output

Optimum Speed, Accuracy and Diagnostic Capability

- Thresholds more than 40% faster than automated projection perimeters
- More than a dozen standard screening and threshold test patterns
- User-created thresholding patterns
- Blindspot, macula, hemianopsia, and meridian programs
- Flexible screening strategies
 - Adaptive contoured suprathreshold
 - Three zone suprathreshold
 - Suprathreshold
- Adaptive contoured suprathreshold screening
 - Adapts to each subject's hill of vision
 - Missed points are thresholded automatically
 - Output is quantitative
- Heijl-Krakau spread logic estimates starting threshold values accurately
 - Few trials required to determine threshold level
 - Multiple threshold crossings at each test point
 - Maximizes test accuracy, minimizes time
- Numerous output options
 - Heijl-Krakau comparative
 - Decibels
 - Grey Scale
 - Four-in-one
- Heijl-Krakau fixation monitor
 - Monitors patient responses to blind spot stimuli
 - Results displayed continuously
 - No operator involvement
 - Non-distracting
- Automatic storage and retrieval of fields
 - Comparison programs enable accurate analysis of fields over time
 - Previous thresholds can be utilized as starting values to speed testing

Innovation, Performance, Value

Digilab was first to combine the benefits of projection and L•E•D perimetry in a unique rear projection L•E•D system. And first to incorporate the advanced testing methodology of Heijl and Krakau which has become the standard of automated perimetry. Now, the Digilab 750 adds another first—the powerful IBM Personal Computer—and a complete library of diagnostic/patient management software to meet virtually every practice need.



IMPERIAL
OPTICAL
CANADA

Instrument Division
21 Dundas Square
Toronto, Ont. M5B 1B7
(416) 595-1010

distributed exclusively by

optovision

Canadian Journal of Optometry
Vol. 48 No. 2



Revue Canadienne d'Optométrie
Juin/juin 1985

OPTOVISION?

Yes, **OPTOVISION**. OPTOMETRIC VISION and eye care. Equal emphasis on OPTOMETRIC and VISION. OPTOMETRIC VISION and eye care as opposed to medical/surgical eye care. OPTOMETRIC VISION and eye care as opposed to optical dispensing.

OPTOVISION, the Canadian Journal of Optometry.

OPTOVISION, la Revue Canadienne d'Optométrie.

OPTOVISION, the official voice of the Canadian Association of Optometrists, representing 2,500 Canadian Doctors of Optometry, 400 students at both Canadian Schools of Optometry and about 100 non-optometric support personnel employed at the national and provincial Association/Society offices all across Canada.

OPTOMETRIC VISION and eye care as it is presented not only to them, but also to academic, health education, government and professional institutions and individuals in Canada and around the world.

But why a new title at all?

Two reasons.

First, there is a growing move by the ophthalmologists of Canada to disaffiliate themselves publicly from that name — ophthalmology, for example, is a word rarely spelled correctly in the press and rarely pronounced correctly on the air. It's difficult to establish an identity when the public can't even spell your name. As a result, ophthalmologists these days are beginning to call themselves the medical eye care specialists, the medical and surgical eye care practitioners, and even *the* eye doctors of Canada, in information packages they present to the public at large, and to the various levels of government with whom they liaise.

Optometry, meanwhile, in its public information programs, continues to use the term "Optometry" in its various forms: optometrist(s); optometric(al), etc.

But, for a moment, remove yourself mentally from the years, perhaps decades of identification as an optometrist, and look at the designation from the point of view of anyone walking past the front door of your office. Where does it say you have anything to do with VISION? Where does *The Canadian Journal of Optometry*, the published voice of the primary vision and eye care profession in Canada, present itself to those *outside* the profession as having anything to do with VISION and eye care?

Reason 2. The face of the Journal is changing. You'll already have noticed our new typeface and design, debuting in this issue and created exclusively for the CJO by an Ottawa graphic design firm — Acart Graphic Services Inc. You'll have noticed new Sections like *The President's Podium* and *Communique*. You will notice additional new features in the issues ahead. In short, you will observe an effort by the Journal to grow.

The CJO is published by the Canadian Association of Optometrists, an organization which, as already pointed out, represents 2,500 optometrists in Canada. But perhaps more importantly, the CJO represents Optometry not only to optometrists — it represents the profession to government, to other health care professions, to the optical industry, to the occupational sector and to the mass media, when they bother to ask. That is the CJO's present and, as mandated by CAO Council, will soon be greatly expanded as part of the Journal's future.

OPTOVISION is a coined word. You won't find it in Webster, the OED, Larousse or Funk and Wagnall's — yet. It is the name of the Canadian Association of Optometrist's official in-house publication, *The Canadian Journal of Optometry*. And it is, at the same time, a bilingual summation of what this magazine represents — everything that is OPTOMETRIC VISION and eye care.

optovision

Canadian Journal of Optometry
Vol. 48 No. 2



Revue Canadienne d'Optométrie
June/juin 1986

OPTOVISION?

Oui, c'est **OPTOVISION**. Soins OPTOMétriques de la VISION et des yeux. L'accent porte aussi bien sur OPTOMétrie que sur VISION. Il s'agit des soins OPTOMétriques de la VISION et des yeux par opposition aux soins médicaux et chirurgicaux des yeux, et par opposition aussi à la prestation d'ordonnances.

OPTOVISION, la Revue canadienne d'optométrie.

OPTOVISION, the Canadian Journal of Optometry.

OPTOVISION, l'organe officiel de l'Association canadienne des optométristes, représente 2 500 docteurs en optométrie du Canada, 400 étudiants des deux écoles canadiennes d'optométrie et environ 100 membres du personnel non optométrique d'appui des bureaux national et provinciaux des associations et sociétés partout au Canada.

Il s'agit des soins optométriques des yeux et de la vision, présentés non seulement à ces personnes, mais aussi aux universitaires, au personnel d'éducation en matière de santé, aux organismes gouvernementaux et professionnels et à la population du Canada et du monde.

Vous vous demandez peut-être pourquoi ce nouveau titre.

Pour deux raisons.

D'abord, les ophtalmologistes du Canada tendent de plus en plus à se dissocier publiquement de leur désignation — le mot ophtalmologie, par exemple, est rarement épelé correctement dans la presse et rarement prononcé correctement en ondes. Il est très difficile d'établir une identité quand le public n'est même pas capable d'épeler votre nom. C'est pourquoi les ophtalmologistes choisissent maintenant de se faire appeler spécialistes en soins médicaux des yeux, praticiens des soins médicaux et chirurgicaux des yeux et même *les* médecins des yeux du Canada, dans les trousseaux d'information qu'ils présentent au grand public tout comme auprès des divers paliers de gouvernement avec lesquels ils ont des rapports.

Pendant ce temps, l'optométrie, dans ses programmes d'information publique, continue à se servir du terme "optométrie" et de ses dérivés, optométriste, optométrique, etc.

Mais oubliez pour quelques moments ces années, voire même ces dizaines d'années pendant lesquelles on vous a reconnu comme optométriste et situez-vous du point de vue de celui qui passe devant votre porte. Où est-il affiché que vous vous occupez de la VISION? Dans la *Revue canadienne d'optométrie*, qui est l'organe public de la première profession oculo-visuelle du Canada, où est-il dit à ceux de l'*extérieur* que notre profession touche à la VISION et aux soins des yeux?

Deuxième raison: l'aspect de la revue n'est plus le même. Vous aurez déjà remarqué, pour la première fois dans le présent numéro, nos nouveaux caractères et un format révisé, créations exclusives d'une société de graphistes d'Ottawa, Acart Graphic Services Inc. Vous avez vu les nouvelles rubriques, par exemple *La tribune du président* et le *Communiqué*. Vous trouverez d'autres nouveautés dans les numéros à venir. Bref, la revue veut grandir.

La Revue canadienne d'optométrie est publiée par l'Association canadienne des optométristes, organisme, nous l'avons déjà dit, qui représente 2 500 optométristes du Canada. Ce qui est le plus important, toutefois, c'est que la revue représente l'optométrie non seulement auprès des optométristes, mais aussi auprès du gouvernement, des autres professions de la santé, de l'industrie optique, du secteur professionnel et des médias d'information, lorsqu'ils veulent bien s'intéresser. C'est le rôle actuel de la revue, rôle appelé à être rehaussé dans l'avenir, suivant le mandat conféré par le Conseil de l'ACO.

OPTOVISION, c'est un néologisme. Vous ne le trouverez ni dans Larousse, ni dans Flammarion, ni dans l'Oxford, ni dans le Webster, ou du moins pas encore. C'est le nom de l'organe interne officiel de l'Association canadienne des optométristes, la *Revue canadienne d'optométrie*. Du même coup, c'est l'expression bilingue de ce que représente cette revue: tout ce qui relève du soin OPTOMétrique de la VISION et des yeux.

CONTENTS



Canadian Association of Optometrists

Association Canadienne des Optométristes

President

Dr. Bruce Rosner

President-Elect

Dr. Scott Brisbin (Alberta)

Secretary Treasurer

Dr. Tom Adamack (British Columbia)

Past-President

Dr. Ralph Rosere

Council

- Dr. Jim Krueger (Saskatchewan)
- Dr. Keith Letts (Manitoba)
- Dr. Margaret Hansen des Groseilliers (Ontario)
- Dr. Jean-Marie Rodrigue (Quebec)
- Dr. Les Clements (New Brunswick)
- Dr. Ron Haines (Nova Scotia)
- Dr. David McKenna (Prince Edward Island)
- Dr. Jim Patriquin (Newfoundland)

Executive Director

Mr. Gérard Lambert

Director of Communications

Mr. Michael DiCola

Optovision

Editor in Chief

Dr. G.M. Belanger

Managing Editor

Dr. Roland des Groseilliers

Business Manager

Mr. Michael J. DiCola

The CJO is a quarterly publication with offices in Ottawa at the Canadian Association of Optometrists, Ste. 207-77 Metcalfe St., Ottawa, Ontario K1P 5L6. Telephone (613) 238-2006.

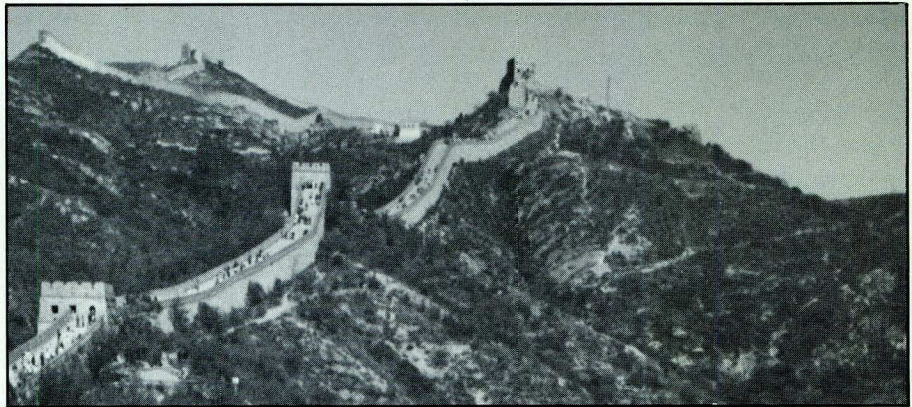
Layout and Design: Acart Graphic Services Inc.
Typesetting and Printing: Love Printing Service Ltd.

COVER

Cover photograph reprinted by permission and courtesy of Carl Zeiss (Canada) Ltd.



Return Postage Guaranteed



Special Features

President's Podium	68
CAO Communiqué	72

Articles

Control of Glare for VDT Operators <i>G.Y. Mousa, M.E. Woodruff</i>	77
People-to-People Citizen Ambassador Program Optometry Delegation — China <i>G. Lecker</i>	81
A CJO Interview: Edward B. Higgins, the first full-time Director of the Canadian Association of Optometrists	85
The Effect of Meridional and Overall Aniseikonic Corrections on Perceived Distortion Due to Small Astigmatic Correction: Bitoric Spectacle Lenses <i>K.M. Robertson, A. Remole</i>	91

Features

Editorial	74
Vision Care News	93
CAO Sections	98
Book Review	108



LET'S CELEBRATE SOMETHING SPECIAL.



100 million Hydrocare "Fizzy" Protein Remover Tablets have been used already.

For more than ten years you've recommended Hydrocare "Fizzy" Protein Remover Tablets and with good reason.

Hydrocare "Fizzy" Protein Remover Tablets have been used successfully by over one million Canadian contact lens wearers.

Hydrocare "Fizzy" Protein Remover Tablets have proven to be effective and compatible with all soft (including extended wear) and gas permeable contact lenses.

Allergan, through its commitment to research and development, will continue to bring you the finest products in contact lens care.

HYDROCARE "FIZZY" PROTEIN REMOVER TABLETS.
NOW ONTO THE NEXT 100 MILLION.



PRESIDENT'S PODIUM

Over-Supply/ Under-Supply

The network that provides vision and eye care services to Canadians needs rethinking and re-alignment!

It is time for major planning and action by Government and the applicable professions to ensure quality vision and eye care in the future.

Many questions, however, must first be addressed.

Do we need more optometrists, more ophthalmologists, more opticians? What is the future relationship to be between these groups? What type of training is appropriate for the services they are to deliver? Where does each group fit into the total scheme of things? How much control over vision and eye care should be allowed by Government, by the consumers, by the professional Associations and Colleges, by the corporate sector? Are the present checks and balances within the system adequate? What ratios of professionals to population are realistic for each group of service providers?

The list goes on and on.

We can see the glimmering of an answer when studies are published such as the Western Canada Health Manpower Training Study, the studies of vision care service delivery in Ontario, the study, commissioned by CAO, *Forecasting Optometrist Supply Requirements to the Year 2005*, etc.

But when reviewing these studies, some additional concerns become clear. First, it is necessary to consider all the service groups together, particularly in terms of their remarkable impact on each other's statistics. For example, if there should be a rapid growth in the number of dispensing opticians, who is going to provide the basic prescriptions from which they are able to initiate their services?

Secondly, the cost of training practitioners becomes a factor if there is an overlap in their scope of practice. Why train an ophthalmologist for over eleven years, with the emphasis on surgery and disease management (secondary and tertiary levels of care) when many spend a high percentage of their practice time in primary care? Would it not be more appropriate to have Optometry further dominate the primary care field? Consider, too, that 95 percent (!) of the vision and eye care patients in Canada

require primary care services. The specialized training in physiological and ophthalmic optics, along with the management of the patient's functional vision needs, are the optometrist's areas of specialty.

Next, we must also consider the practitioner/population ratio game. Even given the diversity of the Canadian population profile, the quest for an "acceptable" national ratio goes on. Ophthalmology: 1:28,000? 1:30,000 or higher? Optometry: 1:10,000? 1:8,000 or lower? Certainly a number of recent studies have indicated that there is a projected over-supply of ophthalmologists and opticians. There is also presently an under-supply of optometrists.

With a growing need identified for optometrists in consultative roles, for example, to Government and to Industry in the Low Vision and geriatric care fields (particularly as Canada's aging population continues its progressive statistical trend), one needs look no farther than Quebec to see how an optometrist/population ratio of *less* than 1:8,000 has promoted a high standard of vision throughout the province.

It is fine to have studies and statistics, but it is necessary now to start using the knowledge we gain, and have gained, from them. It is important that a rational direction be carefully considered to define the roles the various players are to take in the future. Left unplanned, trends may develop which will be counterproductive to the visual welfare of all Canadians.

CAO has produced a major manpower study, a Role Document and an Optometric Consultant's Role Model for use within Government. A June meeting of all optometric leaders in Canada at Interaction '86 has contributed greatly to the further preparation by this profession for its future place in Canada's national health care planning!

Bruce N. Rosner, OD
President

MOT DU PRÉSIDENT

Trop ou pas assez

Il y a lieu de repenser et de rajuster le réseau qui assure les soins opculo-visuels aux Canadiens

Il y a lieu de repenser et de rajuster le réseau qui assure les soins opculo-visuels aux Canadiens.

Il est temps que le gouvernement et les professions intéressées mettent en chantier des plans et des mesures de taille afin d'assurer des soins opculo-visuels de qualité dans l'avenir.

Toutefois, il faut d'abord se poser plusieurs questions.

Nous faut-il un plus grand nombre d'optométristes, d'ophtalmologistes ou d'opticiens? Quels seront les rapports entre ces trois disciplines à l'avenir? Quel genre de formation convient aux services qu'elles offrent? Quelle est la place de chacune dans l'ensemble? Quel niveau de contrôle peut être exercé sur les soins des yeux et de la vision par le gouvernement, par le consommateur, par les associations et les collègues professionnels et par l'industrie? Les contreponds actuellement en place suffisent-ils? Quel est le rapport idéal entre le nombre de praticiens de chaque catégorie et la population?

Et la liste continue.

On peut trouver l'ombre d'une réponse dans les résultats d'une variété d'études, par exemple l'étude sur la formation des professionnels de la santé dans l'Ouest du Canada, les études qui ont été faites en Ontario sur la prestation des services opculo-visuels, l'étude commandée par l'ACO sur la prévision de la demande de services optométriques jusqu'à l'an 2005 et tant d'autres.

En lisant ces études, on constate que bien d'autres questions se posent. D'abord, il faut considérer tous les groupes collectivement, particulièrement du point de vue de l'effet marqué que chaque groupe exerce sur les autres du point de vue statistique. Par exemple, s'il devait y avoir accroissement rapide du nombre d'opticiens d'ordonnance, qui fournirait les ordonnances sur lesquelles repose leur commerce?

Deuxièmement, le coût de la formation des praticiens devient un facteur s'il y a chevauchement de leurs aires de pratique. Pourquoi former un ophtalmologiste pendant onze ans, en lui inculquant toutes les connaissances voulues en matière de chirurgie et de traitement des pathologies (niveau des soins secondaires et tertiaires) alors que nombre d'entre eux consacrent une très grande part de leur temps aux soins primaires? Ne serait-il pas préférable que

l'optométrie assume une position plus dominante à l'égard des soins primaires? N'oublions pas que 95% (!) des patients bénéficiant de soins opculo-visuels au Canada reçoivent un traitement primaire. La formation spécialisée en optique physiologique et ophtalmique et la gestion des besoins de vision fonctionnels du patient relèvent de la spécialité de l'optométriste.

Et il faut aussi penser au ratio praticiens-population. Bien que le profil démographique du Canada soit très diversifié, le rapport idéal à l'échelle nationale nous échappe toujours. Ophtalmologie : 1:28 000? 1:30 000 ou plus? Optométrie : 1:10 000? 1:8 000 ou moins? Plusieurs études récentes ont certes montré qu'on peut s'attendre à ce qu'il y ait un surplus d'ophtalmologistes et d'opticiens à l'avenir. Actuellement, il y a aussi un manque d'optométristes.

Vu que se manifeste un besoin grandissant d'optométristes comme conseils, par exemple auprès du gouvernement et de l'industrie, dans le domaine de la basse vision et celui des soins gériatriques (surtout lorsqu'on sait que la population du Canada continue à vieillir au plan statistique), il suffit de considérer l'exemple du Québec pour voir comment un rapport optométriste-population *inférieur* à 1:8 000 a occasionné un relèvement du niveau de la vision partout dans la province.

Il est excellent d'avoir des études et des statistiques, mais il est temps de commencer à tirer parti des connaissances qu'elles nous ont procurées et continuent à nous procurer. Il est important de définir les rôles qui seront dévolus à l'avenir à chacun des joueurs dans le cadre d'une orientation raisonnée. En l'absence de planification, il se peut que naissent des tendances qui sont au détriment de la santé visuelle de tous les Canadiens.

L'ACO a préparé une vaste étude de main-d'oeuvre, un document sur le rôle de l'optométriste et un modèle du rôle du conseiller en optométrie à l'usage du gouvernement. La tenue d'Interaction 86 en juin, occasion de rencontre de tous les dirigeants de l'optométrie au Canada, a contribué beaucoup à la préparation de la profession pour son rôle futur dans la planification des soins de la santé au Canada.

Le président,
Bruce N. Rosner, OD

Let's clear up a few things about anti-reflection coatings.

Anti-reflection coatings on CR-39 provide very valuable properties you may not be aware of.

First, they *do* reduce reflections.

Second, by doing so, they allow up to 5% more light through the lens for an image with more contrast. They actually boost light transmission from 91% to 96%.

Third, they do form a protective surface on the lens. And, if the lens has been tinted, coatings seal the tint coat in, providing protection against fading.

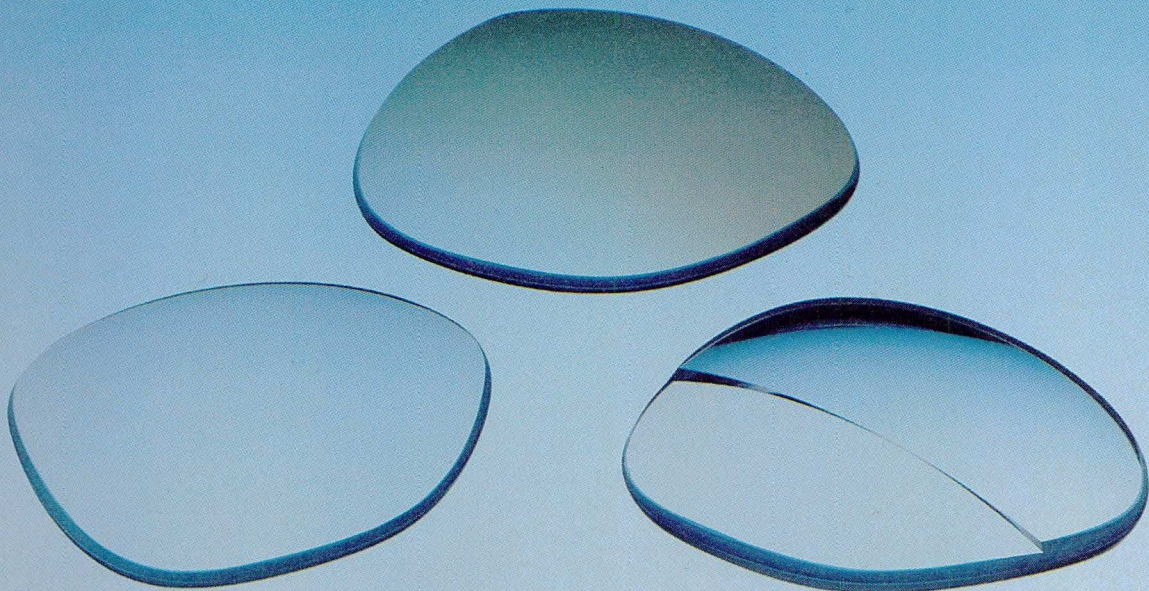
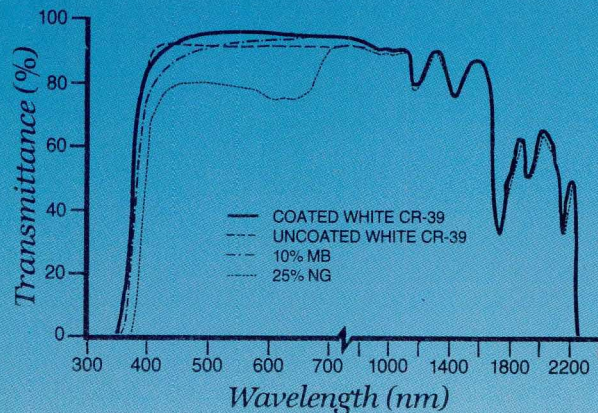
An anti-reflection coating on CR-39 should be recommended where glare and false images caused by light reflections on the lens can lead to eyestrain and headache. People who have to drive at night, work in rooms with fluorescent light, or with computers, are exposed to these problems.

The biggest misconception is that you have to send to Europe for this kind of quality. Europe has now come to you.

Optocoating uses the most advanced, high vacuum technology developed by our parent

company in Germany. Our Mississauga laboratory processes orders the day they are received and the coated lenses can usually be sent out the same night.

Anti-reflection coatings have other important advantages that increase user comfort and safety. They're all described in a free brochure available from your lab.



Optocoat ML[®]
The Clear Choice.

THE SUCCESS LENS

ALGES®

(hefilcon A)

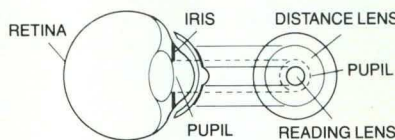
BIFOCAL CONTACT LENSES

THE BIFOCAL CONTACT LENS THAT WORKS.

Introducing ALGES®, the new soft bifocal contact lens from University Optical Products, Co. It's the ideal solution for your presbyopic patients. With qualified patients, successful fitting rates of 70% and better have been achieved.

The ALGES® Soft Contact Lens is based on a unique approach to the bifocal function, which represents an unprecedented advancement in design and manufacture. The near vision add is placed in the center of the lens and covers 50% of the pupil area at reading

light levels. Concentric around the reading lens is the distance lens.



SUCCESS IS REPRODUCIBLE!

To assure that you have the exact prescription necessary,

BASE CURVES	8.6 and 8.9mm
DISTANCE POWERS	- 4.00 to + 4.00 in 0.25D steps + 4.00 to + 6.00 in 0.50D steps - 4.00 to - 6.00 in 0.50D steps
NEAR ADD POWERS	2.00, 2.50, 3.00, 3.50
ADD DIAMETERS	2.12 and 2.35mm

Standard lens diameter is 14.0mm. Lenses outside this range are available on a custom basis.

there are 656 different combinations of inventoried lens parameters available. Any lens can be replaced at anytime.

The new ALGES® lens is tested, proven and available now. Ask your sales representative for a demonstration.

EXCLUSIVELY DISTRIBUTED IN CANADA BY PCL

TORONTO	862-8585	800-268-8548
DARTMOUTH	463-5800	800-565-7183
MONTREAL	878-9887	800-361-8443
WINNIPEG	947-0621	800-665-8603
SASKATOON	653-3711	800-667-8718
CALGARY	259-3878	800-352-8211
BURNABY	437-5568	800-663-9206
EDMONTON	423-2854	800-272-8867

© 1986 University Optical Products Co.
Largo, Florida USA

Exclusively Distributed by 



COMMUNIQUE

EDITOR'S NOTE

This section of *The Canadian Journal of Optometry* is a selection of excerpts, highlights and précis of material which has appeared in *The CAO Communiqué*.

Communiqué is a national Bulletin issued by the Ottawa administrative office of the Canadian Association of Optometrists. It is circulated, approximately once every two months, to current members of provincial optometric Association and Society Councils, both Canadian Schools of Optometry and the past national Presidents of CAO.

The opinions quoted in the items which appear here are not necessarily those of either the Canadian Journal of Optometry or the Canadian Association of Optometrists.

CAO members interested in following up on any of the items which appear in this section are invited to contact directly their provincial CAO Councillor.

Cette section de la *Revue Canadienne d'Optométrie* est consacrée à une sélection d'extraits, de points saillants et de résumés des titres ayant paru dans le *Communiqué*.

Le *Communiqué* est un bulletin national provenant du bureau national de l'Association canadienne des optométristes à Ottawa. Il est diffusé, environ tous les deux mois, aux personnes couramment membres des conseils des associations et sociétés d'optométrie des provinces, aux deux écoles d'optométrie du Canada et aux anciens présidents nationaux de l'ACO.

Les opinions exprimées dans les articles reproduits ici ne sont pas nécessairement partagées par la *Revue Canadienne d'Optométrie*, ni par l'Association canadienne des optométristes.

Les membres de l'ACO qui désirent approfondir les sujets traités dans cette section sont priés de communiquer directement avec leur conseiller provincial de l'ACO.

Competition, Lobbying Under Review

In Ottawa recently, Bill C-91, the Competition Act has been tabled. The Bill, according to Consumer and Corporate Affairs Minister Michel Coté, is designed "to protect the marketplace in order to give consumers the widest selection of goods at the lowest possible price", as well as provide Canadian business "with a fair opportunity to compete".

The Act will affect current legislation governing mergers, specialization agreements and, at the same time, will allow the federal government to step in and end "anti-competitive practices" as may be identified by a Competition Tribunal also to be established under the new Bill.

Meanwhile, the Hon. Michel Coté also tabled recently a discussion paper on lobbying and the mandatory registration of paid lobbyists in an effort to maintain "open channels" between the federal government and business, and between private interest groups and the public. The discussion paper highlights four underlying principles which, according to Coté, form the basis for any proposals to regulate lobbying in Canada: openness, clarity, accessibility and administrative sim-

licity. The paper also discusses the experience of other countries in this area and examines various registration systems in terms of their applicability to the Canadian circumstance.

Canada Labour Code Amendments

Changes to the Canada Labour Code designed to combat job-related accidents were finally proclaimed by the federal government on April 1, 1986.

Labour related accidents cost Canada an estimated 1,000 fatalities and \$2.5 billion in compensation claims annually. The new amendments essentially give workers the right to refuse hazardous assignments on the job, as well as making mandatory the establishment of health and safety committees in workplace where there are 20 or more employees. For the first time in Canadian labour history, the amendments also extend the Code and its related protections to Canada's 300,000 federal public servants.

Increased Funding for University Research

Science and Technology Minister Frank Oberle and Secretary of State Benoit Bouchard announced in a joint news conference that funds available

to the Natural Sciences and Engineering Research Council (NSERC), the Social Sciences and Humanities Research Council (SSHRC) and the Medical Research Council (MRC) will be increased by an estimated \$1 billion to \$3.4 billion over the next five years.

Oberle added that the increased funding would be made available to the country's university granting Councils and includes a formula for a one to one matching by government of private sector investment up to a maximum of 6 per cent of each Council's annual budget (an amount which presently runs to some \$369 million per year in total).

Schema Research Survey Wrongly Suggests CAO Endorsement

Throughout the month of January, Canadian OD's began receiving a questionnaire from Schema Research Limited. In a cover letter, Schema claimed that each provincial optometric Association had been informed of the survey and that Schema Research adhered to the Code of Ethics as defined by the Professional Marketing Research Society.

On January 30th, CAO contacted the President of Schema to advise him

(continued on page 105)



1369

LUXOTICA 

BY

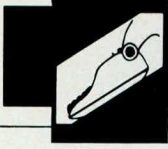
AVANT-GARDE 
OPTICS, LIMITED
OPTIQUES, LIMITÉE

947 Verbena Rd., Mississauga, Ont. L5T 1T5

CALL US—IT'S FREE!

From Area Code:	CALL
416 (Free Call)	(416) 673-8104
416 (Toll Areas), 519, 613, 705	1-800-387-6720
418, 506, 514, 807, 819, 902	1-800-387-6623
204, 306, 403, 604, 709	1-800-387-6705

Téléphoniste Parlant Français— Des Indicateurs Régionaux:	APPELEZ
418, 514, 613, 819	1-800-387-3919
506, 902	1-800-387-4947



EDITORIAL

Professional Liability and Litigation

The Thin Edge of the Wedge?

With the ever increasing trend towards consumerism and the accompanying demands for greater privileges and rights for the consumer, there has been an increasing number of lawsuits against all types of health care practitioners. Underwriters, quite naturally, are seriously concerned with this trend, especially in light of all too frequent extraordinary awards favouring the plaintiffs.

One immediate result has been a tripling of premiums for professional liability insurance for some physicians in several states in the US. Certainly other health care practitioners have been affected, but it is physicians who have been hardest hit. Even the nursing profession is giving this aspect of management deeper consideration. To date, Optometry has had a minimal number of lawsuits.

The number of legal actions against Canadian practitioners, meanwhile, is growing, albeit not as fast as in the United States and all professions, as a result, are having to review their attitudes on this matter. Optometrists are at risk in two areas particularly: failure to recognize and refer pathological conditions and failure to counsel patients properly as to the limitations of the lenses and frames of safety eyewear.

Statistics show particularly that eye injuries arising from the shattering of safety lenses and breakage of frames are increasingly the subject of lawsuits. The actual charges vary, depending on the nature of the injury and the judgement of the plaintiff's counsel as to the winnable aspects of a particular case.

The following two cases reveal the different approaches taken in two suits, one of which was successful and the other lost by the plaintiff.

In one, a plaintiff obtained a pair of industrial safety glasses which were shattered as a result of an accident in a squash game. The plaintiff won his suit on the basis that the practitioner had not informed the plaintiff that carbonate lenses in a more appropriate frame would have provided better protection.

In the second case, the patient obtained a pair of dress safety lenses which he felt would provide adequate overall protection. However, he happened to walk directly in front of a golfer who was driving off from a tee. The ball struck the glasses, shattering them and causing a severe trauma, including a cataract. The glasses at that time were two years old and had been dispensed by a practitioner who had since retired and, in fact, was no longer living in the patient's city. The plaintiff, unable to sue the dispenser, brought suit against the laboratory which had fabricated the glasses. This case, however, was dismissed on the grounds that the patient had not acted prudently by stepping out in front of a golfer as he teed off. The laboratory, in its turn, was able to satisfy

the court that their certificates of impact resistance warn wearers that safety eyewear is not unbreakable, demands some care and that, further, normal wear and tear can reduce the impact resistance capability of such lenses.

What then is the moral to this story?

Actually, there are several.

All practitioners should carry adequate liability insurance. Prescribers and dispensers alike need to keep proper records as to the type of safety lenses and frames supplied, who fabricates them and what the accompanying certification actually says.

Practitioners should explain the types of safety lenses available and the limitations of certain frames, depending on the intended use of the glasses. In this respect, one may have to prepare a written handout to cover fully these explanations.

For example, **Group 1:** Ordinary hardened crown glass with thickness that varies with the power and size of the lenses; ordinary CR-39 plastic, which is better than glass with thickness that varies with the power and size of the lenses.

Group 2: Dress safety: either crown glass of thickness at least 2.2mm, tempered by chemical or thermal methods; CR-39 plastic of appropriate thickness.

Group 3: Industrial safety lenses. Industrial safety frames are a prerequisite; crown glass of a thickness at least 3.0mm, tempered by thermal or chemical means; CR-39 plastic of appropriate thickness.

Group 4: Theoretically the best protection possible, but still breakable. Dress thickness polycarbonate lenses; industrial thickness.

The selection of the frame, particularly for sports use, presents a problem. Eye wire rims larger than the diameter of a squash ball are not recommended for this sport. If the ball were to dislodge the lens, it should not then be able to pass through the frame rim. In industry, the safety supervisor or the consulting safety specialist will indicate the need for side shields. Depending on the type of work, a lens size may also be indicated that will assure the maximum protection.

A handout, based on the foregoing discussion, would be one way to inform our patients. Another would be to enlarge a copy and display it in the dispensing area of the office.

The very least a practitioner should do is record all aspects of the glasses and the patient's comments with respect to intended use.

GMB

Musings on Aniseikonia and Monocular Ocular Implants

Monocular cataract extraction followed by lens implantation is a surgical procedure which is becoming more sophisticated, more successful and less risky, which

EDITORIAL

accounts for its increasing popularity among physicians and patients, not to mention some optometrists.

The main advantages appear to be the potential restoration of binocular vision and the elimination of bulky spectacles or the difficulty that some patients have with contact lenses. Of course, as most of these patients are elderly, some type of over-correction is essential to permit reading or other near point tasks, unless a monovision technique is applied.

There is one aspect of monocular ocular lens implantation which may not have been given the attention it deserves, but which optometrists are best equipped to understand and to manage. We are referring to the induced aniseikonia and induced vertical prismatic effects resulting from this modern surgical procedure.

The study of aniseikonia has been taught in undergraduate courses since the early forties, which is not even to mention its presence on many lecture programmes and continuing education courses up to the early seventies. Most optometrists and optometry students tend to consider the study of aniseikonia as a mere theoretical concept and not as a clinical entity. As a result, they neglect the subject once they have passed their licensing examinations. Fortunately, this attitude is changing, particularly for present day students who are exposed to the more recent developments in the aniseikonia clinics at our schools of optometry. Aniseikonia is now becoming a real clinical entity as the number of monocular ocular implants increases in our aging population.

In cases of monocular cataract surgery followed by ocular lens implantation or the use of an aphakic contact lens (in which the fellow eye is normal and unlikely to require surgery for months or years, if at all), the presence of aniseikonia cannot be ignored. Optometrists, upon return of the patient after surgery, have a responsibility to test for its presence and to counsel the patient and correct the condition if symptoms such as discomfort or space distortion are produced.

From our studies in physiological optics, we have learned that a change of 1mm in axial can induce up to 3 diopters of refractive change. We know that the nodal points of the eye are nominally 7mm posterior to the cornea and that their position will be varied if there are changes in the values of the optical components of the eye; anterior chamber depth, crystalline lens power and thickness of the lens and axial length. Changes in the indices of the aqueous and vitreous may not be significant but do have some influence, at least theoretically. In addition, the position of the pupil and the principal planes also affect the retinal image size.

What effects on total refractive power of an eye and magnification of the retinal image will result in an anterior or posterior implant is used? Implants are much thinner than the crystalline lens. Is such a variation a significant factor on refraction and magnification? Does corneal curvature and its sag value to the angle where the clips on an anterior chamber implant come to rest affect the results significantly by inducing variations in the new chamber

depth? Does corneal curvature change enough due to the surgery to influence the overall outcome?

Biometry using an ultrasound device has come of age. This will no doubt facilitate the choice of the power of the implant and indicate its best location if the overall optical properties of the eye are to remain unchanged from the pre-operative state. But is such an outcome possible since the implant cannot be located in the same position as the crystalline lens? Can the design of implants be further refined to accomplish this or changes be made to the material's index and still remain non-toxic?

There remains a basic and fundamental question. Should the ultimate result be directed to achieving ametropia or to a refractive state approximating the pre-cataract refractive status?

True, this discussion becomes academic if the fellow eye must undergo surgery in a relatively short time. However, there are sufficient numbers of monocular ocular implant cases in existence to reactivate an interest in aniseikonia and its clinical applications.

GMB

ALLERGAN INC.

Sales Rep of the Year Judi Howson



Allergan Inc. is pleased to announce that Ms. Judi Howson has been selected as the Sales Representative of the Year. Judi has been with Allergan for five years. Her territory covers Southwestern Ontario.

*Clean, rinse, store
and disinfect soft lenses†
...the easier way.*

*The Two Solution
Polyclens*/Polyflex* System.*

Peroxide-free simplicity.

The Polyclens/Polyflex System is less complicated and easier to use than hydrogen peroxide systems. Its single step disinfection process eliminates the inconvenient waiting and risk of irritation due to inadequate peroxide neutralization.

Simplicity encourages compliance.

This simple two solution system avoids the confusion and inconvenience of three solutions. Polyclens thoroughly cleans lenses while Polyflex not only rinses, but stores and disinfects. And with only one bottle for rinsing and disinfecting there's little risk of using the wrong solution. When it comes to simplifying lens care, two solutions really are better than three.

†Recommended only for all Daily Wear Soft Contact Lenses with a 50% water content or less. Now also recommended for use with the Permaflex and Sauflon Extended Wear Lenses.

Polyclens/Polyflex*
The Uncomplicated Unperoxide System.*



Alcon Canada Inc.
Toronto, Canada L5N 2B8

*T.M. Authorized user



Control of Glare for VDT Operators

*Evaluation of Different Lenses by Subjects****

G.Y. Mousa*
M.E. Woodruff**

The widespread use of video display terminals (VDTs) in offices has been accompanied by many complaints of visual problems. A recent study by the Canadian Labour Congress on vision problems among 2,300 office workers showed that VDT operators report twice as many vision problems and require more frequent changes in lens prescription.¹ Visual complaints have stimulated research into new means of relieving the discomfort experienced by VDT operators. Murch² recommended low plus lenses to relax the accommodative system. Osterberg³ found significant changes in the accommodative system after VDT work: after two hours at the terminal, the eyes became more myopic for distance and more hyperopic for near. Sivak and Woo⁴ provided the scientific reason for the preference of green phosphor colour by the VDT operators, demonstrating that at the viewing distance of 50 cm. the wavelength in focus is 520 nm. (green).

A recent study by the Canadian Labour Congress on vision problems among 2,300 office workers showed that VDT operators report twice as many vision problems and require more frequent changes in lens prescription.

Glare is caused by excessive luminance of light sources or parts of the field of view. There are two kinds of glare:

1. Disability glare is caused by scattered light in the eye which falls on the focussed image on the retina and reduces contrast, thus impairing vision of objects.
2. Discomfort glare induces a feeling of discomfort without

necessarily impairing the vision of objects.

Disability glare is not influenced by the type of light source employed, while discomfort glare seems to depend on the wavelength of the light source. DeBoer⁵ has demonstrated that low-pressure sodium lamps (monochromatic yellow light) cause less discomfort glare than high-pressure mercury lamps (blue-greenish light). The fluorescent lamp is a low-pressure mercury lamp coated with phosphors, which emits some radiation in the UV range.⁶

Materials and Methods

Three groups of lenses were evaluated by the subjects in this study. The first group was the UV filter (UV-400 or Unilite). The second group was made up of various pink lenses (Pink 2, Tonelite 2, Cruxite AX) and the third group consisted of CR39 lenses. All these lenses were framed and were made available to the subjects.

Forty-five volunteers, VDT operators and/or photophobic subjects, participated in this study. Following a visual assessment, emmetropic subjects or contact lens wearers were selected. Initially, each participant was given two pairs of tinted glasses, one of the pink group and one of the UV-filter group. The subject was asked to wear these two pairs of spectacles alternatively for two weeks while working at the VDT or under fluorescent light, and then evaluate the effectiveness of these two lenses by answering the questionnaire. Subsequently the experiment was modified; a clear lens was added and the subjects were given three pairs of spectacles to evaluate. Those who had two pairs initially were given a third pair to compare. The questionnaire is based on the Likert scale.⁷

Results and Discussion

Forty-five subjects participated in this study; three withdrew, and forty-two answered the questionnaire. Thirty-four were VDT operators and sixteen had a history of

* M.Sc., Ph.D., O.D., Optometric Institute, Toronto

** O.D., Ph.D., School of Optometry, University of Waterloo

*** Part 1: Transmission of fluorescent light through UV filters and pink lenses, appeared in *CJO*, Volume 48, No. 1 (March, 1986).

migraine. Nineteen of the VDT operators were bothered by glare from fluorescent light (56%). Fourteen complained of eyestrain after working at the VDT terminal (41%). Twelve patients (35%) complained of migraine headaches. This percentage of migraine sufferers is higher than expected. Troost⁸ indicated that migraine affects 10% of the population, and we have found⁹ that 10.5% of a patient sample at an optometry clinic suffers from migraine. The high incidence of migraine in the present study could be due to the fact that migraine sufferers were more inclined to volunteer as subjects, seeking relief, or, on the other hand, there may be a higher incidence of migraine among VDT operators. The confirmation of the latter possibility requires further study of a large group of VDT operators.

Statistical analysis was done on the responses to the questionnaire, with +1 point given to the specific lens for a response of "agree" or "strongly agree." On the first question, relief of discomfort under fluorescent lights, lens A got 26 points (70%), lens B got 23 points (62%), and lens C got 6 points (16%).

In answer to the second question regarding VDTs, more subjects preferred lens A than B, and very few preferred lens C. Few responded to the third question, whether the lenses reduced the frequency of migraines, but lens A was still preferred over lenses B or C (Table 2). Logistic regression

was done on these values, where the probability was calculated for lens A vs. C and lens B vs. C. The P value was more significant for lens A vs. C than for B vs. C. However, the P values were statistically significant for both A vs. C and B vs. C, especially on the first question.

These results suggest that VDT operators and photophobic subjects prefer UV filters over clear lenses and that they also prefer pink lenses over clear ones.

When VDT operator vs. non-VDT operator and photophobia vs. non-photophobia were used as variables, the P values were statistically insignificant.

These results suggest that VDT operators and photophobic subjects prefer UV filters over clear lenses and that they also prefer pink lenses over clear ones. Although more subjects preferred the UV filters, some definitely preferred the pink lenses. Thus, the best approach would be to allow the patient to choose either UV filters or pink lenses by trying both. Thus, it is recommended that optometrists enclose a UV filter or a pink tint or both in the lenses when prescribing spectacles for the VDT operators.

		Strongly Agree	Agree	Undecided	Disagree	Strongly Disagree
1. Lens A/B/C provided relief from the discomfort you normally feel under fluorescent lights.	A:					
	B:					
	C:					
2. Lens A/B/C provided relief from the discomfort you normally feel while working at a VDT.	A:					
	B:					
	C:					
3. The use of lens A/B/C reduced the frequency of migraine headache experienced.	A:					
	B:					
	C:					

Lens A is the yellow lens
 Lens B is the pink lens
 Lens C is the clear lens

The completed questionnaires were tabulated and analyzed by a statistical consulting service. When the response was "strongly agree" or "agree", it was given a value of +1. When the response was "undecided", "disagree", or "strongly disagree," it was given a value of 0. Logistic regression was done on these values, where the three types of lenses, A (UV filter), B (pink) and C (clear) were used as variables (predictors). The probability (P) was obtained by

the formula $\log \frac{P}{1-P} = \text{intercept} + \text{type of glasses} + \text{VDT use} + \text{photophobia}$, where the type of glasses, VDT use, and photophobia were considered as variables.

Acknowledgement:
 This research was supported by a grant from the COETF to Dr. G. Mousa.

TABLE 1

PATIENTS PROFILE

Total number of patients 45-3 withdrew = 42

12 Males
34 VDT Operators
16 Migraineurs

30 Females
8 Non VDT Users

TABLE 2

LENSES PREFERRED BY THE SUBJECTS

N	Q ₁ (Fluorescent Lights) 37		Q ₂ (VDT) 37		Q ₃ (Headaches) 16	
	Points	% Preferred	Points	% Preferred	Points	% Preferred
Lens A	26	70%	18	53%	7	44%
Lens B	23	62%	15	44%	3	18%
Lens C	6	16%	3	9%	1	6%

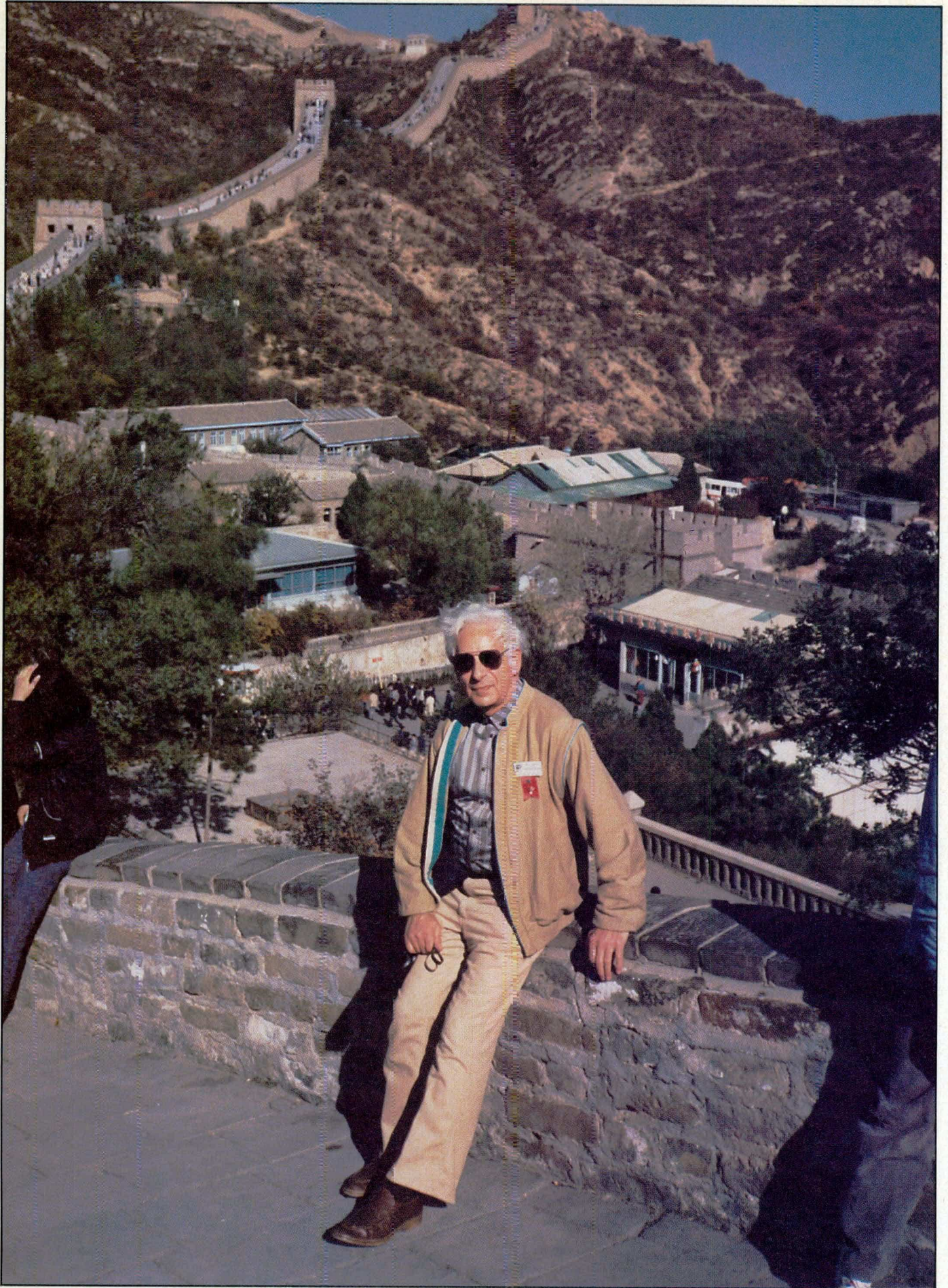
TABLE 3

P values for Lens A vs C and Lens B vs C

	Q ₁	Q ₂	Q ₃
Lens A vs. C	.0073	.0094	.0633
Lens B vs. C	.0286	.2727	.6928

References

1. Towards a More Humanized Technology: Exploring the Impact of Visual Display Terminals on the Health and Working Conditions of Canadian Office Workers. A survey conducted by the CLC Labour Education and Studies Centre, Ottawa, Ontario, December 1982.
2. Murch, Gerald, "How Visible is Your Display?" *Electro-Optical System Design* 14(3): 43-49, 1982.
3. Ostberg, O., "Accommodation and visual fatigue in display work." In *Ergonomic Aspects of Visual Display Terminals*, ed. E. Grandjean, London, England (Taylor and Francis Ltd.), 41-52, 1980.
4. Sivak, J.G. and Woo, G.C., "Color of visual display terminals and the eye: green VDTs provide the optimal stimulus to accommodation." *Amer. J. Optom. and Physiol. Optics* 60(7): 640-642, 1983.
5. deBoer, J.B., "Modern light sources for highways," *Journal of IES* 3: 142, 1974.
6. van Bommel, W.J.M. and deBoer, J.B. Road lighting. Philips Technical Library, p. 57-93, 1980.
7. Rezler, A.G. "The assessment of attitudes," in *Development of Educational Programs for the Health Professions*, World Health Organization, Geneva, p. 74, 1974.
8. Troost, B.T., "Migraine," in *Clinical Ophthalmology*, ed. T.D. Duane, Philadelphia (Harper and Row), vol. 2, ch. 19, pp. 15-16, 1981.
9. Mousa, G.Y., Woodruff, M.E. and Pierson, M.A., "Prevalence of migraine headache among an optometric clinic sample," *Canad. J. Optom.* 46: 17-20, 1984.



People-to-People Citizen Ambassador Program

Optometry Delegation — China

G. Lecker*

This particular adventure really began on April 25, 1985, when I received an invitation from Dr. Irvin Borish to join an optometric delegation to the People's Republic of China.

The initial invitation to North American optometrists to assemble such a delegation had to come from the Chinese Medical Association.

The initial invitation to North American optometrists to assemble such a delegation had come from the Chinese Medical Association to People-to-People International, whose Citizen Ambassador Program originates from Spokane, Washington. Dr. Borish supervised the circulation of the Chinese invitation throughout the US and Canada and, to the amazement of both himself and the People-to-People

organization, no less than 58 optometrists accepted. Together with spouses and a few fortunate office personnel, the delegation actually consisted of 102 people and turned out to be the largest group ever sent by the People-to-People Citizen Ambassador Program. From Canada, there were Drs. Sadie and Jim Lampard, Doug Freeman, Norman Roach and myself. In addition, there were three optometrists from England. The balance of the delegation, including two Puerto Rican optometrists, was American.

The entire group met first in Seattle, Washington, for a very thorough briefing on our trip. We reviewed the cities we would visit and were introduced to a number of specific aspects of Chinese protocol and customs. Sunday, October 6th, we left by air for Hong Kong and promptly lost a whole day as a result of crossing the International Date Line. Strong headwinds en route created an additional loss of time and we finally touched down in Hong Kong four hours late at 11:30 pm.

We began with the luxury of having Tuesday morning to ourselves, but found that we still had to rush things such as shopping. (The men in our group, incidentally, held their own with the ladies when it came to buying, thank you.)

When we at last began our trip into China, it was by train from Hong Kong to Gangzhou (Canton). Coach trains, on time, leave Hong Kong at 1:00 pm and cross into the People's Republic of China a short 35 minutes later. Attesting to the apparent special status being accorded our tour group, we occupied the only two coaches on the train which might have been termed "modern".

As we progressed, we saw from the train a small part of China's traditional agricultural background — rice paddies, sugar cane, bananas, even fish hatcheries. In addition, we saw frequently that farmers are still making extensive use of water buffalo and the people we passed in the fields seemed to come straight from pictures of China we had seen many years ago. Here and there we did see the occasional tractor or truck (of varying ages) which, in fact, were perhaps more numerous than expected from our first impressions of the peasant farming practices.

Gangzhou itself is an ancient city, parts of which actually go back to about 250 BC. It is also, however, a large, industrial city with a population in excess of 2 million and there are many new buildings in evidence as well.

Here too, we were treated to the first

*OD, F.A.A.O.
Sydney, NS

The author at China's most famous landmark —
The Great Wall.

of many examples that our group was to be welcomed as special. We were housed in the Gangzhou guest house, a government hostelry, modern in every respect and set in a walled compound with beautiful gardens and armed guards at the gates. The guards, it turned out, were not posted to keep us in, but to keep the general populace out.

Some of us went for walks that night, a simple exercise which, in Gangzhou, can be quite an experience.

During our stay in Gangzhou, we were not in the least restricted in our movements.

Some of us went for walks that night, a simple exercise which, in Gangzhou, can be quite an experience. There are no street lights and cars (many of them new and, in fact, many more Mercedes limousines than we had counted on) run *without lights*. Canadian optometrists who are campaigning for daytime running lights would find that, in Gangzhou, drivers first will have to be convinced of the merits of driving with them on at night!

As expected, we were treated to an ever changing medley of Chinese food. What we did not expect was the quantity — twice a day in anywhere from 15 to 25 courses. And whoever said this type of food does not stay with you? We all found it did. In fact, with no fibre or roughage, it stayed and stayed.

We spent the morning of the 9th at the Dr. Sun Yat Sen Medical Centre in the Department of Ophthalmology. The Centre is actually a large teaching hospital that is always filled to capacity. Patients, in fact, have to wait in shelters outdoors before getting in for treatments.

The Director of the Department met us and, because of our numbers, we broke up into five groups with an interpreter physician being assigned to each.

The hospital, sadly, reflects a negative part of the history of the country and its past inhibitions against growth and initiative — the pillage by England, Portugal and France, their

In virtually all of the clinics we visited, a Snellen chart at the end of the room and a trial set were in evidence.

own Civil War and, most devastating of all, the cultural revolution of recent years. There is now, however, a great endeavour to catch up and China must be regarded with a good deal of respect for her recent efforts to upgrade health, housing, etc. in addition to its current wave of agricultural, industrial and scientific endeavours.

Despite being devoid of all but the essentials and despite lacking in much of the diagnostic and treatment equipment that we in North America take for granted, the care given to patients in hospitals is good.

Examination rooms for vision care still leave much to be desired, but in this area, too, the Chinese are seeking improvements. In virtually all of the clinics we visited, a Snellen chart at the end of the room and a trial set were in evidence. We also saw a Chinese made slit lamp in one hospital and, in

another, a Topcon automatic refractor (whose findings are used more as a guide in what are purely subjective examinations). We saw ophthalmoscopes only occasionally in the examination areas and retinoscopes were almost non-existent.

We were shown some Chinese laser equipment, similar to older models in use in North America. "Technicians", trained by ophthalmologists, we were told, perform most of the vision examinations but without regard for possible pathology.

In the Sun Yat Sen Medical Centre, some of the treatment procedures incorporate traditional acupuncture therapy.

Most of the spectacles we saw did not incorporate a correction for astigmatism. In fact, for the most part, the Chinese citizens of Gangzhou wear glasses of a ready made variety, vended on the street. We did find, however, a few optical outlets where frames and lenses are made up to prescription.



Gangzhou street vendor and his wares.



Acupuncture treatment for optic neuritis.

In the Sun Yat Sen Medical Centre, some of the treatment procedures incorporate traditional acupuncture therapy. We witnessed its use in one case of optic neuritis and, another time, in a case of optic atrophy. We were also given a demonstration of the eye exercises that school children perform each day to avoid stressful conditions and to try and avoid myopia. Since glasses are expensive, one pair of spectacles may actually be a shared appliance among several students in a class.

While we did not ourselves see contact lenses being fitted, we were told that, at present, PMMA lenses are being used because "soft lenses cost too much". (One refracting room did have an AO ophthalmometer.)

American Hydron, however, is opening a plant in Shanghai. We found this to be so when we arrived in Beijing and were the guests of Hydron at a banquet. In this country of contrasts, after our tour, which included some outdated and ill-equipped hospital facilities (although

also some modern, well-equipped ones), we found our banquet was in a revolving dining room on the 24th floor of a thoroughly modern hotel.

Beijing is a city which, like China itself, is evidently undergoing many changes. Not the least of these is the large scale building of new housing. Construction cranes are everywhere atop new highrise dwellings, all of which are owned by the government. Rental, however, is nominal and the city's older and more squalid areas are being eradicated, but only very gradually.

We were also told that, among young couples, the one child per family edict is in force and is being well observed. With China's population of 1.2 billion people being added to at the rate of tens of thousands per day, and the limited resources available for such a population being ever more reduced, strong controls on parenthood are understandable.

The next day, we spent an entire morning at the Number 3 Teaching Hospital in Beijing, giving lectures and

discussing vision care methods with our hosts.

It had been our intention from the very beginning to introduce them to Optometry. We took advantage of every opportunity to touch on the many aspects of optometric training and the primary role which optometrists serve in vision and eye care.

We also toured a modern glass lens plant, spending much of an afternoon there, where we noted that spheres were the order of the day.

That evening (October 11th) was perhaps the most memorable of the many special evenings of our trip. Our delegation was honoured with a lavish banquet in the Great Hall of the People's Republic. We saw but a small part of the building. In contrast to the earlier part of our trip, we were restricted to a very specific portion of the Hall and the security was extreme. At the front door, no invitation meant no entrance.

**It had been our intention
from the very beginning
to introduce them to
Optometry.**

There are several elements in common to all such banquets in China and they are these — lots of food, potent drinks, few speeches and no more than two, or two and a half hours for the proceedings to conclude. Toasts may be proposed by anyone (after those from the head table are completed) and protocol requires that every toast proposed must be drunk by everyone in attendance. At our Great Hall banquet, every table had seated, as a host, at least one member of the Chinese Medical Association. Despite some language difficulties, we managed to enjoy a thoroughly congenial evening.

There were several days when we had some time for sightseeing, visiting the Ming Tombs, the Great Wall, the Forbidden City, etc. Only twice did we see pictures of Mao, one of which was in the Tien An Nen Square where 1 million people can assemble!

After the day of sightseeing which followed our banquet in the Great Hall, we checked out of our lodgings at Fragrant Hill — whose name, we discovered, becomes painfully obvious

as you come down off the hill — and drove into Beijing 25 kilometres away to the airport for a scheduled flight to Nanjing. When the moment came to board, however, we were advised that the flight had been cancelled. Nanjing, as it turned out, has no facilities to bring an aircraft in during either rain or darkness and so, despite the best efforts of the Chinese Medical Association to maintain our schedule (even to having chartered the aircraft in the first place), they were unable to get us to Nanjing for our meetings the following day.

Beijing's bustle during a business day is a condition any Canadian city's Chamber of Commerce would envy.

Returning to our hotel, we found that the unscheduled rain which had forced the cancellation of our flight had created a few more difficulties — our hotel rooms had vanished. (We did manage, however, to get into the Beijing Hotel — to sleep on a restaurant floor. Although a somewhat discomfiting circumstance, it was lessened considerably by the cashmere blankets we were issued.)

We took full advantage of our extra day in Beijing. It was our own and everyone toured the city. Beijing's bustle during a business day is a condition any Canadian city's Chamber of Commerce would envy. The streets and the stores were all jammed. The demand for imported consumer goods has greatly increased in recent years, forcing the Chinese government to come to terms with the growing pressures on the economy. Among those problems, the Chinese reluctantly admit to talk of corruption, black markets and a growing crime rate, all related to this burst of consumer demand.

We left Beijing on the 14th, aboard our chartered aircraft (the weather over Nanjing having cleared up). Nanjing, like Beijing, is another ancient city but, unlike Beijing's obvious success with its urban renewal programs, shows substantially less progress in this area.

Nanjing's hospitals on the whole seem rather bleak and barren and,

while every attempt is being made to produce good health care in the city, facilities simply cannot keep pace with the demands placed upon them. There are shortages both of space and trained health care manpower. Certainly we were impressed with the skill exhibited by the surgeons we did witness at work but we felt, too, that they were performing under conditions which we in the west would generously label less than ideal.

We noted also the absence of all but the most limited means of providing vision and eye care services.

The Chinese have many skills, however, and not the least of these is the evident engineering miracle of the bridge across the Yangtze River at Nanjing. Given the tools and the means, they are unquestionably capable of achieving a great deal, but at the risk of sounding repetitive, the obstacles are many, particularly in health care, and perhaps the greatest of these barriers to modernization is the present dearth of trained, professional manpower.

We must be prepared to assist the Chinese when (and if) they request help in setting up their health care programs.

Throughout our visit to China, our discussions on health care with our hosts focussed repeatedly on the primary care services provided by professions like Optometry and how such a role could serve their needs. I for one had the feeling that our message was well-received, a feeling reinforced by the depth of the questions we were asked.

In the final analysis, we must be prepared to assist the Chinese when (and if) they request help in setting up their health care programs, particularly, as optometrists, those programs designed to provide adequate vision and eye care to their people.

Our trip was winding down, but still the occasional bug in the system reared its head. Despite all the plans, for example, we never even got to Zuchow, the next city on our itinerary. As it turned out, our hotel had been fully taken over by the President of the Italian Communist Party. (Previously,

in fact, our hotel in Nanjing, the "Jinling", had been unavailable to us for dinner one evening for a similar reason.)

Our last evening in China turned out to be one of contrasts. Dinner this time was accompanied by entertainment — Peking opera, dance, orchestra, etc. and I seriously suspect that a mere handful of people can include among their life experiences eating beef stew with chopsticks while listening to a Chinese tenor sing "O Sole Mio" in Italian! It was a fitting end to our visit to China and, early on the morning of the 18th, we boarded a train again, this time for a six hour trip to Shanghai and thence, by plane, to Hong Kong.

A full evaluation of this delegation's visit to China would take six months and more paper than *The Canadian Journal of Optometry* runs through the presses in a year. However, our initial impressions are that we gave our hosts what they sought — a frank and in-depth appraisal of their existing vision care system, together with our indications of what we feel their needs to be, now and for the future.

In so doing, we discussed with them the wide range of services that Optometry provides and left them, we feel, with the desire for much more information.

The results, and any measure of the success of our visit, will be measured by the extent and the nature of any follow-up by the Chinese.

To be represented professionally in the most populous nation on earth is the *minimum* goal to which Optometry should aspire.

Optometry in North America, however, should not wait only for movements on their part. To be represented professionally in the most populous nation on earth is the *minimum* goal to which Optometry should aspire. The leaders in our profession on this continent should continue the efforts instigated by this delegation and perhaps a few of their own by offering to provide professional assistance and consultation when and as requested.

A CJO Interview:

Edward B. Higgins, the first full-time Director of the Canadian Association of Optometrists

Editor's Introduction

In 1975, the Canadian Association of Optometrists' Council granted an Honorary Life Membership in the Association to E.B. Higgins.

In 1985, the Council of CAO again recognized the outstanding contributions of Ed Higgins and awarded him a specially struck plaque in commemoration and appreciation.

The plaque was originally intended for presentation at CAO's 1985 Biennial Congress in Regina. Ed, however, was unable to attend and so Council authorized Dr. G.M. Belanger, CJO Editor and long-time friend of Ed Higgins, to present it at a gathering which took place at the Higgins home late last year. Also present for the occasion were Dr. Irving Baker, Registrar of the College of Optometrists of Ontario, Mrs. Helen Baker, Mrs. Françoise Belanger and Dr. Ron Macpherson, who was President of CAO from 1971-1973.

In making the presentation of the plaque to Mr. Higgins, Dr. Macpherson alluded to his long and distinguished contribution to the growth of the profession in Canada.

In 1975, the Canadian Association of Optometrists' Council granted an Honorary Life Membership in the Association to E.B. Higgins.

"I recall those years," he said, "when you travelled thousands of miles, addressing provincial Associations and local Societies, collecting information, analysing it and finally preparing the necessary drafts for presentation to the federal government and various interprofessional committees. Many in the profession wondered from where you derived your tireless energy and your patience. I remember seeing you look perplexed, and occasionally anxious, but never despairing. Those of us who were close to you soon realized that you considered your work a dedication more than a job. We also observed that your wife, Dorothy, was a strong and inspiring ally in the cause you so skilfully espoused."

That Optometry today is covered

by the Health Insurance programs in nine Canadian provinces, that Government recognizes and accepts without question the profession's position in the primary health care field in Canada, that new graduates are able to enter one of the most respected professions in this country, is due to the contribution of this one man. The Higgins interview, which begins in this issue, has already spawned several supplementary written commentaries by the likes of Harold Coape-Arnold, Austin Forsyth and Colonel Jim Duffey, role-players all in the formative stages of the profession. Much of this material is being assembled for presentation in future issues of the Journal.

It is with a great deal of pride and appreciation that the CJO begins this story. The 100-page Higgins Report, which was the accumulation of the data obtained on the cross-country trek alluded to above by Dr. Macpherson, should be mandatory reading for optometrists in Canada.

Here then is Part 1 of the CJO interview with Ed Higgins.



L-R: Dr. Maurice Bélanger, Mme. Françoise Bélanger, Dr. Ron Macpherson, Ed Higgins, Mrs. Helen Baker, Dr. Irving Baker

Ed Higgins was born March 11, 1911 in Transcona, a suburb of Winnipeg. His mother was on the Faculty of the Teacher's College in London, Ontario. His father owned and operated a hardware store in Transcona which he sold in 1919 before moving to Toronto to join Great West Life as an administrative representative.

Ed's early schooling took place in Toronto and he was graduated from Grade Thirteen at Central Collegiate, the same central technical school where Optometry began in Ontario.

Registering initially in Business Administration at the University of Western Ontario, he transferred after two years to Dalhousie University, coincident with his father's appointment as provincial Manager for Great West Life in Nova Scotia.

Ed completed his undergraduate degree in Business and went on to obtain his M.A. in Economics and Political Science. He returned to Toronto and worked for Canada

Packers for four years, enrolling in their in-house Executive Training Course.

He enlisted in the Royal Canadian Air Force and obtained his pilot's wings, achieving the rank of Captain upon his discharge. Back in civilian life, he joined an advertising agency and, five years later, he was invited by one of his own major clients to join them as full-time Associate Managing Director. The firm, in fact, became E.B. Higgins Management Consultants later on.

As a professional consultant, Ed served a total of 34 different trade and professional Associations for over twenty years, among them the (then) Toronto-based Canadian Association of Optometrists.

In 1966, Ed was appointed as Officer Brother of the Order of St. John of Jerusalem.

After severing his connections with CAO in the late 1960's, he also sold his interest in the firm to his partners and joined the Faculty at Lakehead Community College in Thunder Bay (now Lakehead University) as an instructor in Business Administration,

Human Relations and Public Relations.

Sadly, two subsequent heart attacks forced a resignation from the faculty and he retired to Trenton, Ontario where he now is under the care of the Hallowell Nursing Home staff. His health, however, is improving once again and Ed spends several days every two weeks at home with his wife, Dorothy.

Always willing to welcome visitors or correspond with professional colleagues, Ed can be reached at 199 Henry Street, Trenton, Ontario, K8V 3V1. Telephone (613) 394-2946.

(In the interview that follows, "CJO" is Dr. Maurice Belanger, Editor in Chief; "EBH" is, of course, Ed Higgins. Occasional comments were also provided by Drs. Irving Baker and Ron Macpherson and, when this occurs, they are introduced by their respective initials.)

CJO: Ed, can you recall the very first contact you had with official Optometry?

EBH: It was in 1949 or 1950 that Dr. Fred Attridge, who happened to be our family optometrist, discussed some of Optometry's professional



L-R: Ed and Dorothy Higgins

problems with me and informed me that the Ontario Association of Optometrists was seeking a Public Relations Counsellor to direct and plan a PR Program the Association was projecting. Previous programs had been directed by optometrists, members of the Ontario Council, among whom Drs. Doug Pearsall and Bob Thomson were major motivators.

Dr. Attridge, by the way, is a former Ontario President and was thoroughly familiar with the activities of the OAO. He introduced me to Irving (Baker), who had just been elected to the Presidency of the provincial Association. Soon after, it was arranged that I would also be introduced to the Council of the OAO at one of its monthly meetings and I was hired the following meeting.

CJO: Do you recall your initial impressions of the profession after your hiring as OAO PR Counsellor?

EBH: Oh, yes. Quite well, in fact. I was introduced to a group of professional people who had high ideals, but who had no idea of the manner in which they would achieve those ideals. They seemed to lack self-confidence and I recall that even their attitudes and personal appearance seemed to contribute to these impressions.

They seemed insecure and, to some degree, lacked an esprit de corps necessary to pull together to meet a common goal.

You have to realize that, at that

time, optometrists considered themselves as competitors with each other, rather than as colleagues. Fees in those days varied from free examinations to (what were then) very significant fees of \$10.00 to \$15.00.

**I had to become familiar
with the profession inside
and out — its history
and the attitudes of
its members.**

To make matters worse, the appearance of medically sponsored prepaid health plans did nothing to reduce the profession's insecurity or to raise its self-confidence.

So as a management consultant, I felt I could be of great service to Optometry in Ontario, if I could direct the members towards a better professional co-operation, increased self-confidence and faith in the future.

But in order to do the best job possible, I had to become familiar with the profession inside and out — its history and the attitudes of its members.

In the early days of my association with Optometry, I found it to be a real period of growth as far as I personally was concerned. It was a new field of interest and a new challenge to learn, in effect, a new language and to

discover the importance of the role played by Optometry in rendering vision care to the people of Canada. Out of this report I researched came contacts with a number of different "publics" at both the national and provincial levels, since they represent in many cases a duplication of the acceptance factor of your profession.

Certainly, it was a learning period from the very first year of my association with the Ontario group. OAO work gave me, too, a deeper understanding of the range of problems the profession faced at the national level. This involved not only the question of optometrists being observers through hospitals, through the Junior Red Cross, through the Workmen's Compensation Board, but it involved, even then, the relationships which were being considered and sought with other professions, including ophthalmology. It was obvious to me as well that, in any work, I would relate as an external observer to the College of Optometry, to its training and its programs. This was the beginning of my education into your profession in *all* its areas of public interest.

CJO: You helped prepare a number of Briefs during your term of service with the OAO. Could you recall some of them and their importance at that time?

EBH: Their "importance" was of course, a relative thing. To the Council

of the Ontario Association of Optometrists, they were quite significant. The kind of follow-up work that was done with them was really the job of the members of the OAO and their Secretary, O.J. Wycock. There was some progress made, but it was more an overall exercise designed to get the name "Optometry" in front of certain government bodies and so be seen in a more favourable, or at least a more prominent, light.

I can recall some. The Ontario Workmen's Compensation Board was petitioned successfully to accept and pay optometrists for services and repairs to eyeglasses broken or damaged in work situations.

Irving, meanwhile, was approaching the Bell Telephone Company, Dr. Cruikshank the Chief Medical Officer in particular, to accept the OAO's recommended safety plan for Bell employees in which practitioners carried out all services, including dispensing. The practitioner billed Bell for services and cost of material, supplying copies of merchandise invoices. Fees were a matter of agreement between the OAO and Bell.

There were also discussions ongoing with the Junior Red Cross prior to the setting up of a mobile van to screen for vision defects in children. Dr. Norm Roach, now in Fredericton, was the first optometrist to operate the van. Dr. George Woo, who is now on faculty at Waterloo, was second.

After that, however, I am not sure if the project was abandoned or continued by others.

I was also involved in discussions with CNIB, which never seemed to get anywhere despite the presence of some lay Directors on the Board who were favourable to Optometry.

And of course, I spent a lot of time on the telephone, counselling practitioners from all over the province on how to handle discrimination by school nurses, medical officers of health, school boards and even industrial safety officers.

Irving, when he was President, used me regularly as a sounding board whenever he had ideas, particularly before heading into OAO Council meetings. We both found that this provided a good basis for discussion and gave him a handle to guide the topics as they came up during the meetings.

CJO: How did you first become involved with the national Association?

EBH: In 1951, the Canadian Association of Optometrists held its second Biennial Congress in Winnipeg. Already, there was talk of a national health plan of one form or another for Canada. The Haggerty Commission Report had been published and it consisted mainly of reporting the operation of health plans across the world, particularly in Sweden, as potential foundation material for implementing a national program in this country.

CAO Council had elected Harry S. Nowlan as President and one of his first actions was to suggest an enquiry into the status of Optometry in Canada so that we could be better prepared to face the unknown developments which a national health plan in Canada would bring.

I recall that it was actually the suggestion of Irving Baker, then Ontario President, to CAO Council that I would be a good person to undertake such an enquiry because of the broad experience I had had working for the Ontario Association.

So CAO Council, after some deliberation, accepted Irving's suggestion and I was hired and given "carte blanche" to plan and carry out the trans Canada tour of enquiry.

It proved to be quite a challenge in more ways than one. CAO Council affirmed their view of the importance of the task and actually voted most of its very small reserve to pay my salary or fees.

CAO Council affirmed their view of the importance of the task and actually voted most of its very small reserve to pay my salary or fees.

CJO: Can you give us some insight into how you planned a trip of that magnitude and how you prepared the survey questions you would have to ask?

EBH: I sat down with our management staff at the consulting firm and realized very quickly that only an accurate and complete analysis of the profession would permit us to arrive at valid recommendations for a plan of action. We felt that we would have to do three things:

- (i) find out where Optometry has been as a profession.
- (ii) determine its present status in the opinions of the various publics with whom the Association dealt either individually or as an organized group.
- (iii) determine the major problems which existed and the plans that could be made to resolve them.

After becoming familiar with the main historical aspects of the optical profession worldwide, and in Canada and the US more specifically, it became evident to me that our enquiry would depend more on obtaining information from practitioners all across the country than on the formal research into legal documents from optometric archives.

This meant that, in planning my tour, it was essential that I meet with as many groups and individuals as possible in each province. That year, I got tremendous cooperation from the Western provinces, who actually set the dates for their respective annual meetings a few days apart so that I could begin my tour in BC and work eastward to Manitoba. This particular sequence was imposed by the restricted finances made available. Quebec and Ontario did not present any travel problems and the success of the sequential visit to the West led to a similar schedule's being planned in Atlantic Canada.

CJO: Do you recall any misgivings or anxieties crossing your mind as you began your cross-Canada visit?

EBH: None at all. We had done our planning. As a matter of fact, it was just another research project, albeit a massive one as far as I was concerned. But the mechanics were essentially the same. What I did, as I did with other plans, was to find out (a) what the present situation was, (b) what the history of the problems were and (c) what would be the best things to recommend for future action. It was, however, a real training challenge and I acknowledge now with considerable gratitude the assistance I received from all Councils and the hundreds of optometrists across Canada in conducting the survey.

It was a real pleasure to work on this project and to be able to add a bit of knowledge to the CAO Council and the profession based on what I had

Introducing The Newest Member of Our Family...

...IN A WINK Refreshing Drops™



Cleansing and lubricating eye drops, compatible with all soft and gas permeable contact lenses.

Relieves dry eyes safely and effectively.

Contains no thimerosal or chlorhexidine.

Unique formulation with CIBA E.A. enhances comfort, lens movement, lens hydration, and oxygen transmission* without affecting visual acuity.

Available in convenient 15 ml retail size. Sample size also available in an attractive dispenser and all CIBA Care Systems.

*In-vitro data available upon request.
In-vivo studies are pending.

The Total So

AOSept™

Preservative free

- Simple one step disinfection and neutralization.
- Unique formulation combines 3% hydrogen peroxide and buffered unpreserved saline in one solution.
- Catalytic action of the AODisc™ neutralizes hydrogen peroxide in a natural non-chemical method, leaving lenses in isotonic non-preserved saline.



The Total

Daily Wear Options

Prolong



Cibasoft®
Advanced thin lens design for superior comfort; in a wide range of parameters. VISITINT and Softcolors Options available.



Cibasoft® STD
A standard thickness lens that's easy to handle with thin lens comfort. VISITINT and Softcolors Options available.



Cibasoft® Low Plus
Superior comfort and good corneal physiology in a low plus design. VISITINT and Softcolors Options available.



Softcon® DW
A 55% water content lens that is easy to handle with proven durability. Not available with Softcolors.



Torisoft®
Innovative thin zone design provides stability of orientation, good visual acuity and excellent comfort. Available with VISITINT and Softcolors Options.



Bi-Soft®
A soft contact lens alternative for patients who need bifocal glasses. Available with VISITINT and Softcolors Options.



Cibathin®
Ultrathin lens design for prolonged wear flex wear durability. VISITINT and Softcolors Options available.

olution Line



IN A WINK®

For all soft contact lenses

- No thimerosal – No chlorhexidine.
- Simple and effective; 25 minute lens care regimen.
- Neutralizer contains highly refined CIBA catalase.
- Daily Cleaner requires no rinsing.
- Care Systems available with large introductory size bottles.

ens Line

ged Wear Options



Softcon® EW

A 55% water content lens with prolonged wear flexibility and daily wear durability. Available with VISITINT and Softcolors Options for prolonged wear.

Tint Options



VISITINT™

A contact lens tint you can see...until it's on the eye. Offers ease of handling benefits without iris enhancement. VISITINT is a light blue tint with a clear periphery and is available on all CIBA lenses.

Softcolors®

The tint that offers ease of handling benefits with natural iris enhancement. Softcolors are available in six natural colours and three intensities for all CIBA lenses (except Softcon DW).

design with probability and daily available with colors Options ar.

CIBA VISION CARE INC. SUPPORT SERVICES

CIBA Vision Care's commitment is to provide practitioners with quality products, service and innovative support programmes. When you purchase a CIBA lens or lens care product, CIBA gives you more...

Clinical Evaluation Programme Ciba Systems Future Purchase Plan

The **Clinical Evaluation Programme** is designed to provide practitioners with diagnostic lenses and the opportunity to evaluate their performance over a 90 day period.

CIBA SYSTEM Consignment Inventory systems are available in a wide choice of products. Your **CIBA SYSTEM** includes an attractive functional display unit and a convenient monitoring system.

The **Future Purchase Plan** is a comprehensive purchase plan that offers guaranteed preferential pricing on all CIBA products. For more information on selecting the plan right for your practice contact your C.V.C. representative.

Lens Warranties*

The **CIBA Professional Warranty** offers practitioners a 90 day comprehensive torn lens warranty on all CIBA lenses. To ensure your fitting success with Torisoft and Bi-Soft, we provide you with a 60 day **Guaranteed Fit Programme**.

*All warranties are subject to conditions outlined on the CIBA Vision Care Inc. price list.

Lens Returns, CibaCredits and Inspection Report Services

Our comprehensive **Self-Adhesive Return Labels** allow for multiple lens return and provide a practitioners file copy. This unique return form also serves as a self-adhesive return label.

The **CIBA Inspection Report Service** and **Deposit Reference Guide** are designed to give you the most comprehensive information available on lens problems. Our **Inspection Report Service** includes detailed inspection findings, a listing of common lens problems and the associative preventive action, and the option of a microscopic lens photograph.

CIBACREDITS are computer generated to provide you with immediate and accurate lens credits. They are automatically processed on your next order of a similar product. Your new invoice is numerically cross referenced to your CIBACREDIT.

Professional Services

At CIBA Vision Care we are dedicated to sharing our knowledge with practitioners; whether it is technical or fitting concerns; or providing technical support for symposiums. Should you require further information in these areas, please contact our Professional Services Director.



Quality you can recognize on sight.

CIBA Vision Care Inc. 2150 Torquay Mews, Mississauga, Ontario L5N 2M6 (416) 821-4770 Ontario 1-800-268-5892

Western Canada and Atlantic Provinces 1-800-268-3968

CIBA Vision Inc. 205 boulevard Bouchard, Dorval, Québec H9S 1B1 (514) 631-2830 Québec 1-800-361-2434

found, plus use my university training as an economist and a political scientist. It probably was my greatest single consulting experience in terms of seeing a young profession open its eyes more clearly to its basic problems and display its willingness to step up its activities in those areas of importance.

It was the sense of unlimited co-operation that gave me the greatest pleasure. Nobody held back, everybody reported frankly and I believe that, as a result, the so-called "Higgins Report" still stands as a major valid study of a profession in the course of rapid development.

CJO: Have you any unofficial experiences or impressions to recount that may not be included in your report?

EBH: No, not particularly. There were certain confidential aspects which I could not, in all faith, include in my report but, basically, you will find (on page 100 of the report) that I was fairly specific about what you were experiencing from coast to coast with different intensities and different problems.

As an example, if you want one, in New Brunswick, they have very good relationships with the various optical supply houses, something which is not true in many other parts of Canada. Indeed, I note from various studies which we have made that, the further out west and the further down east we go, these relationships seem to improve. This, we are assuming, is in the hands of the optometrists and their local Councils.

CJO: During your cross-Canada tour, you met literally hundreds of optometrists either individually or in groups. Do certain individuals stand out?

EBH: Yes, I visited with every Canadian optometrical Council and, many other times, with more localized group meetings of optometrists as an external observer. I was constantly amazed at the evidence I encountered of progress the provinces had made in terms of continuing or upgrading the education of their members by annual, semi-annual or even quarterly seminars. This was particularly true in the Western provinces, where a strong effort was constantly being made in this field. In Saskatchewan particularly, attendance at these educational seminars ran very high and this was probably the most encouraging aspect

I found in the optometric group as a whole.

I was interested also in those provinces which were faced to a more or less greater extent with the problem of optometrists in practices that were more commercial in aspects than would probably have been expected of a professional group. This is a problem that has yet to be solved, in fact. I have feelings, however, that optometrists do those things they know must be done if they are not only to survive but to enhance their acceptance as a member of the health care profession. This I know they will do but what we must find are the tools, techniques and ideas which will motivate them as carefully as possible towards the future of their profession.

As to individuals, well, several come to mind immediately, but I am sure I will miss a number of others and I hope that those I omit will not be offended or angry with me. Harold Coape-Arnold was CAO President during the years we wrote the Brief to the Royal Commission on Health Services, better known as the Hall Commission. He was the man of the hour with his grasp of the socio-economic effects of a national health plan on the public and on the professions. Although he felt the professions should be free enterprises, he did not shirk his duty as President and worked diligently to place Optometry's position in the best possible light so that if a national plan were instituted, Optometry would be included as a participating discipline.

We evolved a pattern of relationships that was intense, but surprisingly never personal considering the depth and extent of the programs on which we worked together.

Austin Forsyth was another diligent worker behind the scenes, never seeking the limelight but always working, as did his father, to advance Optometry. You tell me he has retired, but something else tells me hardly retired. He's just not that kind of man.

I know, for example, that in his "retirement", he set up the structure and terms of reference for what is now the office of the Executive Director of the Saskatchewan Association of Optometrists.

And I recall Manny Finkleman of Winnipeg. Who could ever forget this humorous man, a great storyteller, an astute diplomat, top class organizer and always the best dressed man in town?

Cliff Palmer of Lethbridge had already terminated his Presidency at the time I got involved with the survey, but certainly his administrative abilities carried on with his successor.

Harry Perrin of Vancouver is another of the old guard who did much more in pushing the need of a national optometric organization than he is given credit for.

John Mulrooney of Halifax finished his term as President, and then became Secretary-Treasurer for nine years, nine difficult years, but he kept us afloat. He served CAO for 15 years, the longest term on Council of any CAO delegate. He was the first recipient of the President's Award, which I for one felt was a most fitting tribute to his years of work and service.

Fred Mignot, former Director of the Montreal School, was the first Quebec delegate to CAO and an indefatigable worker for the Association as he realized too many problems existed at the national level to be tackled by provincial Associations alone and independently. A national federation, he recognized, was essential for progress.

Then there was Eli Boyaner from Saint John, a quiet man but with a keen mind, and never fearful of speaking out if the circumstances demanded it.

IB: Yes, I remember that Eli was Chief Scout for Canada for several years and his study was full of Boy Scout paraphernalia, pictures with the Queen and other dignitaries. He was a man of the world. He could discuss almost any topic, not only Optometry and the Boy Scout movement.

CJO: Ed, can you recall some of the difficulties you had in setting up the first CAO office. For instance, how was it managed? How was it first organized and how eventually did you come to organize it into something that has existed to this day?

EBH: I was hired in the early summer of 1953. It was agreed that I would receive a retainer fee for my services. Office work would be handled by my staff and CAO would be charged for this administrative work as well. My office was at 19 Richmond West at that date. Eventually, we moved to 32 Front Street and then, later to a Bay Street address.

As consultants, we were supposed to

act as Counsel to the CAO. I felt that it would be best if the operation were directed from my own personal management company in order that I might keep a very tight rein on the areas of problems and attempt to view them with objectivity, but from a very close range. From that sprang, of course, a very deep relationship which took me to the position of Managing Director of the CAO on a half time basis.

Then, of course, I accepted the responsibility for working more intensely on the problems, and with the various publics, as had been outlined in my report. There were a number of areas that were all given minor (and some, major) attention. All, in fact, at one time or another were discussed by the CAO Council during my term of eleven years with the national Association.

It was obvious, of course, as we developed (and as I recommended in my report; this was one of the findings of my survey, in fact) that you should have your own national office with your own full-time Managing Director, if you can afford it. This you subsequently did and, while I have remained very interested in Optometry to this day, I have only a scant knowledge of what has actually happened in the profession since 1967.

But, to answer the question, it was not difficult to get the administrative office organized. I gave CAO half of my regular work week, i.e. 5 half days. When attending provincial meetings, my expenses were paid (but not my time, as this was considered part of those half days).

Being in Toronto, I had the opportunity to talk with the faculty at the School (located in Toronto until moving to the University of Waterloo in 1967), Irving, Fred, Mel Katzman (the CJO Business Manager), Maurice as CJO Editor, not to mention most of Toronto's optometrists and the members of the OAO Council with whom I continued to work. All those were my mentors and teachers and contributed greatly to my continued education in Optometry.

CJO: In those early years, as you've already mentioned, finances were very restricted. Can you give us some further insight into this aspect?

EBH: Optometry at that time was very disorganized in a national sense.

Leaders in each province were aware of the problems but the rank and file members basically had to be educated, and then convinced. Attitudes were very provincial and the yardstick to determine priorities was what each individual optometrist had to pay to his or her own provincial group.

For example, Ontario was the only province where membership in the provincial Association was voluntary and some 20 percent were opted out then. An Ontario optometrist's only mandatory fee was a licence fee, but it went to finance the College on St. George. All other provincial Associations' licence and Association fees were mandatory and could be fixed.

The Western and Maritime provinces, with their much smaller numbers, were contributing a far greater percentage or amount per capita than either Ontario or Quebec. (It should be mentioned that, in arriving at provincial contributions, the CAO Council would set up a budget and then ask each province to contribute a fair amount. Ontario and Quebec contributed only lump sums, not a dues payment based on a per capita basis as did the other provinces.)

CJO: But in those lean first years, was any attempt made to get funds from sources other than Association contributions and fees?

EBH: Oh yes, we tried to set up a plan in which the optical supply houses would contribute a certain percentage, say two or three percent from each practitioner's lab bill on frames and lenses only.

But this required the co-operation of the various firms and approval of all practitioners to be successful. It really never got off the ground because of the resistance not only from parts of the industry but also from some of our own practitioners. Approaching the optical firms was not difficult, but there was hesitation on their part to act as a collection agency for optometry.

We investigated the proposal and had decided there was nothing wrong with the basic idea but it did not seem to be fully workable and was eventually abandoned.

CJO: Have you any recollections as to how your meagre finances were handled?

EBH: For the first years, meetings were held in different cities along with the Biennial Congresses and, in the off years, in those cities which would keep travel expenses of the delegates to the minimum. Costs would be totalled up and divided evenly among the provincial Associations over and above their annual payments.

Even the hotels were chosen so as to reduce costs. Which is not to say that we went to 5th class hotels or anything, but rather to those within our finances. Social life during these meetings was at a minimum and often we would be invited to a delegate's home. I can recall having the Council at my home for dinner on several occasions when we met in Toronto. Irving and Helen also played host to Council.

ROI
CONFIDENTIAL
PROFESSIONAL SERVICES

PRACTICE APPRAISALS

Goodwill, Assets, Real Estate

PRACTICE SALES

Market Representation

PRACTICE PROGRAMS

Cost Sharing, Associate Buy In,
Phase Retirement

A.L. Roy Brown, C.A.M.
Professional Appraiser

Mississauga (416) 278-4145
Ottawa (613) 837-7107
Calgary (403) 243-4188

ROI CORPORATION
BUSINESS BROKER
Established 1973

The Effect of Meridional and Overall Aniseikonic Corrections on Perceived Distortion Due to Small Astigmatic Correction:

Bitoric Spectacle Lenses

K.M. Robertson*
A. Remole**

Abstract

A 35 year old male had been periodically prescribed a complete correction for his small amounts of astigmatic hyperopia. Compliance was unsuccessful due to the apparent tilting of the patient's visual surroundings. Using measurements obtained on a new eikonometer called the Multi-meridional Apparent Frontoparallel Plane,¹ bitoric lenses were prescribed and supplied. Aniseikonia and visual perception was evaluated with meridional aniseikonia corrected and then with meridional and overall aniseikonia corrected. Only the latter gave the patient full satisfaction.

Patient DH-35, a lift truck operator, had his eyes examined at the School of Optometry Clinic, University of Waterloo. He had recently received a pair of glasses which were prescribed to correct blurred vision of

* O.D., M.Sc., F.A.A.O., Coordinator, Binocular Vision Clinic Adjunct Assistant Professor

** B.F.A., O.D., M.Sc., Ph.D., Coordinator, Aniseikonia Clinic, Professor School of Optometry University of Waterloo

Résumé

Un homme de 35 ans s'est vu périodiquement prescrire une correction totale de sa condition d'hypermétropie astigmatique peu prononcée. Il s'est avéré impossible de réaliser le niveau de correction voulu parce que le patient souffrait d'un basculement du champ de vision. Grâce à des mesures prises à l'aide d'un nouvel iconomètre à plan frontal-parallèle apparent à multiples méridiens, il a été possible de prescrire et offrir au patient une lentille bitore. On a évalué l'aniséiconie et la perception une fois corrigée l'aniséiconie méridienne corrigée, puis une fois corrigées cette dernière et l'aniséiconie générale. C'est cette dernière correction qui a donné le plus de satisfaction au patient.

his left eye but was unable to wear them because of a perceived apparent tilt of the surroundings. With the new prescription he noted that his vision was better monocularly; however, binocularly the distortions were pronounced. The prescription was evaluated as:

O.D. +0.25 -0.25 × 90 Base Curve

+5.50

O.S. +0.25 -0.75 × 92 Base Curve
+5.25

Interpolar separation = 64mm
This prescription was altered to equalize the cylinder power, cylinder axis, base curve and centre thickness. The following was prescribed:
O.D. +0.25 -0.50 × 90 20/15 Base Curves +6.00
O.S. +0.25 -0.50 × 90 20/20 Base Curves +6.00

The patient wore these glasses successfully for 3 years. At this time he noted that his vision of his left eye was not as clear as his right eye, and the following prescription was ordered after another visual evaluation.

O.D. +0.25 -0.50 × 90 Base Curve
+6.00 c.t. = 3.0mm

O.S. +0.50 -1.00 × 90 Base Curve
+6.00 c.t. = 3.0mm

The patient returned to the clinic complaining that horizontal surfaces seemed to be tilted down to the right while the walls seemed to be tilting further away from him on the right side. He found this intolerable even after an extended period of wear.

He was referred to the Binocular Vision Clinic and the Aniseikonia Clinic for full evaluation. An aniseikonia assessment¹ on the Multimeri-

dional Apparent Frontoparallel Plane, a recently developed precision eikonometer, indicated the following full aniseikonia correction:
 3/4% meridional magnifier axis 90°
 and 0.5% overall magnifier over the left lens.

With this information and using the basic magnifications formulae^{2,3} a prescription was designed.

Right lens: +0.25 -0.25 × 80°

Centre thickness = 2.0mm
 n = 1.523

Front surface = +4.50 sphere

Back surface = -4.53 × 80° / -4.27 × 170°

Left lens: +0.50 -1.00 × 90°

Centre thickness = 3.0mm
 n = 1.523

Front surface = 3.00 × 180 / +5.50 × 90°

Back surface = 2.52 × 180 / -6.06 × 90°

This design theoretically corrected all the measured aniseikonia; however, to evaluate the singular effect of the bitoricity of the left lens two pairs of glasses were ordered. The first pair had equal centre thicknesses (spectacle correction No. 1) while the second pair (spectacle correction No. 2) had centre thickness as described above.

Patient observations and further

Sometimes retinal image clarity is sacrificed to reduce distortion caused by astigmatic prescriptions.

evaluations:

Spectacle Correction No. 1 — The patient noted an improvement of clarity of his vision. He noted that horizontal lines no longer appeared to tilt down to the right. He did note, however, that the walls did still appear to be further away on the right side. Re-evaluation with the Multi-meridional Apparent Frontoparallel Plane indicated that with these bitoric lenses another 0.5% overall was needed over the left eye. This was evaluated after two weeks wear.

Spectacle Correction No. 2 — With pair No. 2 (unequal centre thicknesses) the patient noted no distortions, his vision was clear and no visual aberrations were apparent. A perfect fit in all meridians was noted on the Multi-meridional Apparent Frontoparallel Plane.

Discussion

Sometimes retinal image clarity is sacrificed to reduce distortion caused by astigmatic prescriptions. This patient exemplifies a more sophisticated solution that will permit optimum visual acuity as well as distortion-free binocular vision. The example clearly shows that aniseikonia can cause unacceptable perceptual distortions. However, in order to prescribe successfully according to these principles, the aniseikonia should be measured accurately.

References

1. Remole, Arnulf, "A New Eikonometer; The Multimeridional Apparent Frontoparallel Plane" *American Journal of Optometry and Physiological Optics* Vol. 60, No. 6, pp. 519-529, 1983.
2. Robertson, John K., Introduction to Optics Geometrical and Physical D. van Nostrand Company, Inc., Toronto.
3. Fincham, W.H.A. Optics Halton Press Ltd., London.
4. Jenkins, Frances A. White, Harvey E., Fundamentals of Optics McGraw-Hill Book Company, New York.

REGINA, SASKATCHEWAN

Second Optometrist Needed for a busy two-location practice.
 Excellent salary with guaranteed minimum.
 Flexible Arrangements

Reply to: Box 186J
 Canadian Journal of Optometry
 Suite 207 — 77 Metcalfe Street
 Ottawa, Ontario
 K1P 5L6

FOR SALE

Optometric Practice in beautiful Penticton, B.C. This is your chance to locate in the wonderful Okanagan Valley and a chance to give your children paradise.

Reply in confidence to:
 Box 386J
 The Canadian Journal of Optometry
 Suite 207 — 77 Metcalfe Street
 Ottawa, Ontario
 K1P 5L6

GRENFELL REGIONAL HEALTH SERVICES REQUIRES

An Optometrist for the Charles S. Curtis Memorial Hospital in St. Anthony, Newfoundland effective immediately. This is a 150 bed fully accredited regional hospital providing services for approximately 40,000 people in Newfoundland and Labrador.

This position involves a fair amount of travelling. Applicants must be eligible for registration with the Newfoundland Association of Optometrists.

Salary in accordance with government approved scales. Liberal fringe benefits. Fully furnished accommodations at reasonable rates. Financial assistance given with travel.

Interested applicants should apply to:

Dr. Peter Roberts
 Executive Director
 Grenfell Regional Health Services
 St. Anthony, Newfoundland
 Canada
 A0K 4S0

TELEPHONE: 709-454-3333, Ext. 120



VISION CARE NEWS



Save Your Vision Week 1986 Kicked Off in Style at University of Waterloo Reception

In conjunction with its Spring, 1986 meeting, the entire national Council of the Canadian Association of Optometrists attended the inaugural event for the kick-off of Save Your Vision Week in Canada 1986.

Held at the School of Optometry, University of Waterloo, the kick-off featured a reception in the Clinic's huge waiting area, a presentation by Dr. Lloyd Pinkney, of the National Research Council's Space Vision System Research Program and a brief address by James Jepson, MP, speaking on behalf of Prime Minister Brian Mulroney.

CAO President Dr. Bruce Rosner spoke on behalf of CAO and expressed the Association's thanks to the School's Faculty and students alike for the loan of their facilities for the occasion. Associate Dean of Science and School Director Dr. Jacob Sivak was presented with a framed copy of this year's Save Your Vision Week campaign poster, featuring a shuttle astronaut floating untethered above the earth's horizon and the caption "Life is Worth Seeing!"

CAO President Dr. Bruce Rosner (R) presents "Life is Worth Seeing!" poster to Dr. Jacob Sivak.

Dr. Pinkney, in his presentation, outlined a number of problems faced by shuttle astronauts in their remote manipulation of the orbiter's Canadarm in conditions where depth perception is virtually eliminated owing to a lack of the light softening atmospheric conditions found on earth. Appropriately, it is an area of research in which a member of the optometric faculty at Waterloo, Dr. Werner Adrian, is also working.

Mr. James Jepson



The space theme for this year's kick-off was designed to highlight the acceptance by Captain Marc Garneau, Canada's first astronaut, of the title of Honorary Chairperson for Save Your Vision Week 1986.

Mr. Jepson, who attended with his daughter, spoke briefly in support of the Week's objectives and delivered a letter to Dr. Rosner from Prime Minister Mulroney congratulating CAO on the campaign for 1986.

Alex Saunders Returns to CAO

Reflecting what is becoming a trend among CAO's national office personnel, Executive Director Gerard Lambert is delighted to announce that Alex Saunders has recently been welcomed back to the Ottawa office team as CAO's new Governmental Affairs Coordinator.

Alex had served as CAO's Public Information Co-ordinator from 1980 until 1983 when he joined the Ontario Association of Optometrists as Occupational Vision Plans General Manager while his wife, Estelle, completed her OD program at the School of Optometry, University of Waterloo.

Dr. Saunders will be starting her practice in Ottawa later this fall, with the Saunders' return to the capital (with daughter Dana) coinciding with CAO's identification of the Terms of Reference for the position of Governmental Affairs Co-ordinator.

(CAO members may recall that Director of Communications Mike DiCola also returned to the national office in 1981 following a three-year hiatus, as did former Executive Director Don Schaefer, following Peter Welch's departure.)

Alex's initial mandate will be to consolidate and expand CAO's program of lobbying and communication with several federal government Ministries and Departments in Ottawa as CAO seeks to increase the depth of its contact with the federal political bureaucracy.

VISION CARE NEWS



CAO Inaugurates LV Award at L'École d'Optométrie, Université de Montréal

CAO President Dr. Bruce Rosner presented the first-ever CAO Award of Excellence in Low Vision to a graduating University of Montreal optometrist at this year's convocation ceremonies at the School.

The award was presented to Dr.

Jean-Yves Gosselin "for outstanding academic achievement and clinical proficiency in the specialty of Low Vision" and included a cash award as well as a special plaque commemorating Dr. Gosselin's accomplishment.

Shown in the photo are (L) Dr. Daniel Forthomme, Director of l'École d'Optométrie, Université de Montréal; (C) Dr. Rosner and (R) Dr. Gosselin.

PCL Introduces Four New Products

Plastic Contact Lens Company (Canada) Limited has announced the introduction of four new product lines to its inventory.

Tinted Soft Contact Lenses

CustomEyes are new, fashion-tinted soft contact lenses, made with Polymacon, available in five Perma-tint colours and feature a clear pupil area for untinted vision.

Contact Lens Solution with Trimethoprim

SOF/PRO-CLEAN II, a non-allergenic CL solution containing the preservative trimethoprim and developed by Sherman Laboratories of Abita Springs, California, is now available through PCL. Clinical results have shown the preservative does not produce either allergic sensitivity

or adverse reactions.

Trimethoprim is an antibacterial substance which has been used for years to treat urinary infection. SOF/PRO-CLEAN II marks its first use in CL preservative solutions.

Cosmetic Line for Sensitive Lens Wearers

PCL has obtained the exclusive Canadian distribution rights to the Optique line of Eye Cosmetics for CL wearers and people with sensitive eyes.

The Optique products are low in the oils and fibres which most frequently cause cosmetic related problems like dermatitis, blepharitis and minute corneal abrasions.

Hand-Held Lens Meter

Following an agreement with Pentax Canada, PCL will now distribute the Pentax OLH-1 Lens Meter, an "ultra compact" hand-held lens measuring system for the determination of "precise diopter measurement".

The OLH-1 can measure a lens up to 80mm in diameter and has a vertex

power ranging from $-15.00D$ to $+15.00D$ in $.25D$ steps. Cylindrical axis can be measured from 0 to 180 degrees in 5 degree steps. Prismatic power range is 4 diopters in one diopter steps.

For further information about any of the above, contact:

Mary Jo Braid
Marketing Manager
PCL (Canada) Ltd.
Suite 504, 21 Dundas Square
Toronto, Ontario
M5B 1B7
Telephone (416) 862-8589



Vision-Ease Introduces New Polycarb

Herculens is the name being given by Vision-Ease to its new polycarbonate impact resistant lens for "all-purpose wear".

The lens combines a low specific gravity with a high index of refraction to create what Vision-Ease calls a "thinner, lighter, more comfortable lens". In addition, the lens is "inherently UV protected".

The lens can be obtained in semi-finished single vision and bifocal blanks in a variety of bases and adds.

For further information:

Vision-Ease
PO Box 968
700 54th Avenue North
St. Cloud, MN
56302, USA

VISION CARE NEWS



Keta Introduces Pocket Tonometer

Keta Corporation of Danvers, Massachusetts, has introduced a new self-contained hand-held tonometer. Described by Keta as "compact, accurate and easy to use", the Keta Hand-Held Tonometer comes with built-in rechargeable batteries and a recharger.

List price is \$1,995.00 (US\$) and further information is available from:

Richard D. Tracey
National Sales Manager
Keta Corporation
9 Canal Street
Danvers, MA
01923, USA
Telephone (612) 777-4660

CJO Represented at Soviet Press Reception

CAO's Director of Communications (and the CJO's Business Manager) Mike DiCola recently represented the Journal at a reception given at the Embassy of the USSR in Ottawa.

The occasion, May 6, was Soviet Press Day and it is an annual exercise by the embassy staff to exchange business cards with Ottawa representatives of the working, trade and professional presses.

The CJO frequently receives news releases issued by the Soviet Press Office in Ottawa dealing with health care in general and, in particular, research and development undertaken by the Moscow Institute of Eye Medicine (MIEM)'s Helmholtz Institute, one of the USSR's leading facilities for vision and eye care research.

Biomicroscopy for Contact Lens Practice

Professional Press Books has just produced a new audio-visual supplement to its book, title above.

The package includes 20 35mm colour slides taken from the chapter dealing with Biomicroscopy for Hydrogel Contact Lenses. (In the book itself, these illustrations had been presented in black and white.)

Also included in the a-v package is a printed commentary and audio cassette tape.

The price for the complete package, including a three-ring binder for storage, is \$50.00 (US\$). Further information about the a-v kit, or the book, is available from:

Professional Press Books
7 East 12th Street
New York, NY
10003, USA
Telephone (212) 741-6640

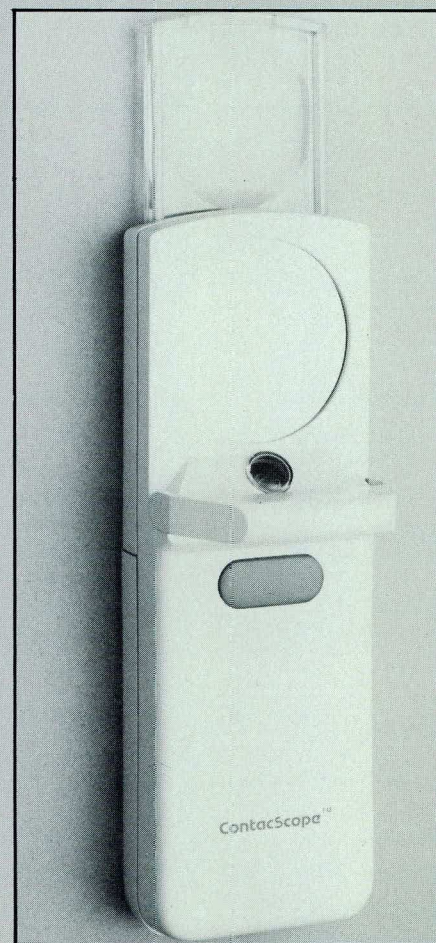
ContacScope Permits CL Viewing While on the Eye

SMC Medical-Tech Corporation has announced the production of a new device, called ContacScope, which permits a contact lens wearer to view close up a contact lens while in place on his/her eye.

ContacScope includes a concave mirror which magnifies the view; a built-in magnifier for increased magnification; a light source which can be used as required and a compartment which accommodates a lens storage case.

ContacScope wholesales for \$4.95 (US\$) and comes with a suggested retail price of \$9.95 (US\$). Further information is available from:

SMC Medical-Tech Corporation
1931 N. Great Southwest Parkway
Grand Prairie, TX
75050, USA
Telephone: (214) 647-2876



VISION CARE NEWS

Digilab Automated Perimeter

Bio-Rad Laboratories' Digilab Ophthalmic Division has announced the introduction of a new automated perimeter, the Cambridge Perimeter.

The Cambridge operates on a rear projection LED system which presents targets without incorporating any moving parts. A full back up package includes screening and threshold software, installation and training.

According to Bio-Rad, the instrument performs "incredibly fast" and is priced "to meet the budget of every eye care practice".

The Cambridge Perimeter lists at \$8,500.00 (US\$) and comes with an optional matching electric table for an extra \$895 (US\$).

Further information:

Bob Nahmias
Digilab
 237 Putnam Avenue
 Cambridge, MA
 02139, USA
 Telephone (617) 868-4330



LV Reading Aid Designed for Everyday Use

A new, portable, high resolution video projection magnification system designed to help the visually impaired read and write at home, at work or at school is being introduced by Optelec USA Inc. of Harvard, Massachusetts.

The Optelec FDR Series Low Vision Reading Aid combines a 750 line at centre monitor, featuring enhanced image contrast with an "easy-to-use" 45x magnification zoom camera. Also included is a low friction X-Y reading table with adjustable margin stops and a ten-inch vertical working distance. The system has the added feature of allowing a switch from positive to negative display mode.

Further information about the system, which is priced at \$1,599.00 (US\$, price includes a 12-inch monitor), is available from:

David Rosette, Marketing
Optelec USA Inc.
 325 Ayer Road
 Harvard, MA
 01451, USA
 Telephone: (617) 772-3395



ERRATUM

An article in the March, 1986 issue (Vol. 48, No. 1) entitled *The Coming Age of the Referral Clinic* inadvertently identified the author as "David" Ruskin. The author's correct name is Dennis Ruskin. The CJO apologizes for the error. Readers who wish any supplemental information with respect to Dr. Ruskin's paper are invited to write to him at his new address: 4190 Finch/Midland Medical Centre, City of Scarborough, Ontario, M1S 4T7. Telephone (416) 293-4309.

For prolonged comfort from dry eye irritation. Take the **TEARS PLUS** test.

This photograph of a hydrophobic surface (like the cornea) shows Tears Plus spreads more easily and is less inclined to break up when tested against another artificial tear.* The moderate surface tension of Tears Plus acts to prolong wettability.

**Sustained wettability
provides prolonged
comfort.**



TEARS PLUS™

For prolonged comfort



**TEARS PLUS for day use,
LACRI-LUBE S.O.P.® for night.**

*Ask your Allergan representative for further information.



Allergan Inc.
SCIENCE WITH VISION



SECTIONS

Section Update: And Then There Were Three

The Council of the Canadian Association of Optometrists formally approved the establishment of two new CAO Sections at its Spring, 1986 meeting held in Toronto, February 28, March 1 and 2, 1986.

As previewed in the March CJO, the two new Sections are as follows: Sports Vision and Contact Lenses. With Children's Vision in place, that makes a total of three Sections now officially operating under the terms of the national Association's By-law Number 52.

The Sports Vision Section's creation was initiated at the 1985 Biennial Congress under Section Co-ordinator and (then) CAO President Dr. Ralph Rosere. The formational meeting was actually held later that year in the Calgary, Alberta offices of Drs. Gene and George Edworthy. The Section is already well along with plans for the provision of optometric vision and eye care services in conjunction with the 1988 Winter Olympic Games, to be held in Calgary.

The Contact Lens Section's foundation was built upon the Constitution as was proposed for the Canadian Optometric Contact Lens Society in 1983, itself a rebirth of the original Canadian Contact Lens society from many years previous. CAO Councillor for Manitoba Dr. Keith Letts served as CAO liaison for the Section and shepherded the Terms of Reference through to their acceptance by the CAO Council at its Spring, 1986 meeting.

Following, then, are the Terms of Reference as approved by CAO Council for each of the two new Sections. CAO members who wish to apply for membership in either of the two new Sections, or in the Children's Vision Section, are invited to complete the application form elsewhere in this issue. The form can also be used to request further information about any of the existing CAO Sections.

Need for a Sports Vision Section

With an increasing awareness by the public, athletes, coaches and governments on Sports Vision provided to athletes in the United States by optometrists, and because a large number of optometrists in Canada have exhibited a keen interest in this specialty, it is imperative that these optometrists be brought together to share their knowledge and experiences in the Sports Vision field and to promote these services to the athletic world of Canada for the benefit of all Canadians.

There is a need to provide the means whereby optometrists interested in Sports Vision would have the opportunity to have current information on new techniques, equipment, etc. to provide more effective means of delivering these services to the public.

Purpose of a Sports Vision Section

1. Enhance sports vision services to the Canadian public.
2. Promote, advance and enhance the identity of Optometry as the profession providing this service.
3. Provide education, research and screening programs in the area of sports vision.

4. Provide a source for information on the subject of sports vision to the profession and to the public; and
5. Provide a forum for members of the C.A.O. having an interest in the sports vision area of Optometry.

Canadian Association of Optometrists Bylaws of the Section on Sports Vision

Article I Name and Purpose

Section 1

This Section shall be known as the Sports Vision Section.

Section 2

The purpose of this section is to enhance the vision care of the public served by practices providing sports vision services; to promote, advance, and enhance the identity of Optometry as a profession providing these services; to assist in the providing of continuing education; to provide a forum for members of the C.A.O. having an interest in this area of Optometry; and to provide a source for information on this subject to the profession and to the public.

Article II Membership

Membership shall be open to any members of the Canadian Association of Optometrists. Unless otherwise specified, each member of the Section shall pay to the Canadian Association of Optometrists annual section dues of \$50.00 except student members of the Canadian Association of Optometrists who shall pay annual section dues of \$5.00.

Article III Officers and Selection Delegate

Section 1

The officers of this Section shall be a Chairperson, Vice-Chairperson and Secretary.

Section 2

There shall be a Council, which shall consist of the Chairperson, Vice-Chairperson, Secretary, and the last retiring Chairperson, together with two other members, to be elected by the Section as hereinafter provided.

Section 3

The Council shall select the Section liaison to the Canadian Association of Optometrists Council.

Article IV Nomination and Election of Officers

Section 1

At least ninety days before the Annual Meeting of the Section in the year that the terms of office expire, the Chairperson shall appoint a nominating committee of three members of the Section not candidates for office. The nominating committee shall, at the Annual Meeting, submit its nominations for the following offices: Chairperson, Vice-

SECTIONS

Chairperson, Secretary and two members of the Council. The report of the nominating committee shall not preclude any member of the section from making a nomination for any office from the floor at the Annual Meeting.

Section 2

Except for the last retiring Chairperson, Council officers and members shall be elected biennially by the Section members at the Annual Meeting of the Section. A majority of the votes cast on a particular office shall be required for election to that office.

Section 3

Terms of office. All terms of office herein specified shall begin at the close of the Annual Meeting at which the election takes place, and shall end two years hence at the close of the next Annual Meeting.

Article V Duties of Officers

Section 1

Chairperson. The Chairperson, or Vice-Chairperson, in the absence of the Chairperson, shall preside at all meetings of the Section, and of the Council. He or she shall formulate and present annually to the Canadian Association of Optometrists a report of the work of the Section for the then closing year. He or she shall appoint the Chairperson of any committees within the Section who are to hold office during his or her term as Chairperson. He or she shall plan and superintend the program of the Section at the Biennial Congress of the Canadian Association of Optometrists during his or her term, subject to the directions and approval of the Section Council. He or she shall superintend the performance of all activities of the Section. He or she shall keep the Council fully informed and carry out its decisions. He or she shall perform such other duties and acts that usually pertain to his or her office or as may be designated by the Council.

Section 2

Vice-Chairperson. Upon the death, resignation or during the disability of the Chairperson, or upon refusal to act, the Vice-Chairperson shall perform the duties of the Chairperson for the remainder of his or her term or disability, as the case may be. The Vice-Chairperson shall aid the Chairperson in the performance of his or her responsibilities in such a manner and to such extent as he or she may request.

Section 3

Secretary. The Secretary shall be the custodian of all books, papers, documents, and other property of the Section, except money. He or she shall keep a true record of the proceedings of all meetings of the Section and of the Council, whether assembled or acting under submission. With the Chairperson he or she shall prepare a summary or digest of the proceedings of the Section for its Annual Meeting for publication in an Annual Report. He or she, in conjunction with the Chairperson as authorized by the Council, shall attend generally to the business of the Section. He or she is to keep an accurate record of all monies appropriated to and expended for the use of the Section.

Article VI Duties and Powers of the Council

Section 1

The Council shall have general supervision and control of the affairs of the Section subject to the provisions of the Constitution and Bylaws of the Canadian Association of Optometrists and the Bylaws of this Section. It shall especially authorize all commitments and contracts which shall entail the payment of money, and so authorize the expenditure of all monies appropriated for the use of benefit of the Section. It shall not, however, authorize commitments or contracts which shall entail the payment of more money during any fiscal year than the amount which shall have been previously appropriated to the Section for such fiscal year. The Council may delegate any of these powers to the Chairperson or the Secretary. The Council may further authorize the Chairperson at the beginning of his or her term to appoint an Executive Committee with the approval of the Council to act in instances when time will not permit the calling of a meeting of the Council. Action by the Executive Committee shall be reported to the Council.

Section 2

The Council may authorize the Chairperson to appoint committees from Section membership to perform such duties and exercise its powers as the Council may direct, subject to the limitation of these Bylaws and the Constitution and Bylaws of the Canadian Association of Optometrists.

Section 3

The Council during the interim between Annual Meetings of the Section may fill vacancies in its own membership or in the office of the Secretary, or in the event of a vacancy in all the offices of Chairperson and Vice-Chairperson. Members of the Council and all officers so selected shall serve until the close of the next Annual Meeting of the Section. In the event of a vacancy in the office of Section delegate, the Council shall select a successor.

Section 4

A majority of the Council shall constitute a quorum for the transaction of business. All binding action of the Council shall be by majority vote of the members present.

Section 5

The Council of the Section during the interim between meetings of the Section shall have full power to do and perform all acts and functions which the Section itself might do or perform, not inconsistent with any action taken by this Section. Any such action taken by the Council shall be reported to the Section at its next meeting.

Article VII Meetings

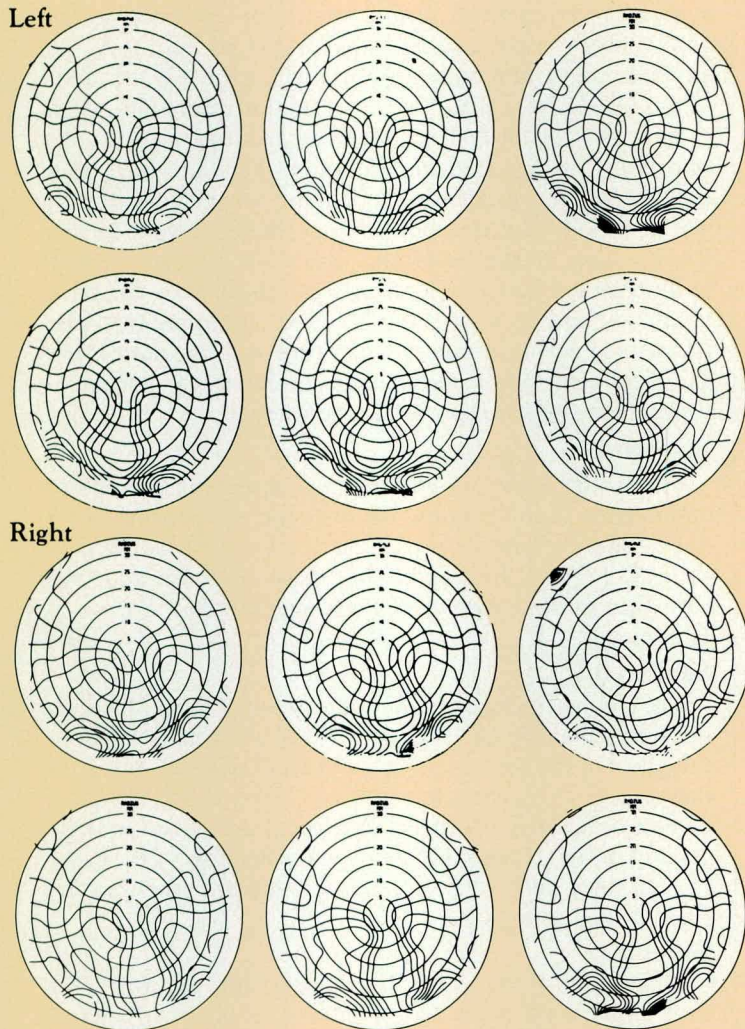
Section 1

The Section shall hold business meetings annually at the place and time so designated by the Council of the Section.

Section 2

Every two years the annual meeting of the Section will be

Before you order your here's something



12 "identical" Varilux 2 lenses.

If you've been having trouble working with Varilux 2 lenses, we're not surprised.

Just look to the left and you'll see why.

These are computer-generated contour maps of 12 seemingly "identical"* Varilux 2® lenses.

Measured on a lensmeter, all 12 yield the same result – plano distance, +2 add. But computer plots of their actual surface designs tell quite a different tale.

As you can plainly see, they aren't "identical" at all.

Viewing areas differ in size and in shape, especially in the near and intermediate zones. And the astigmatic patterns vary from lens to lens.

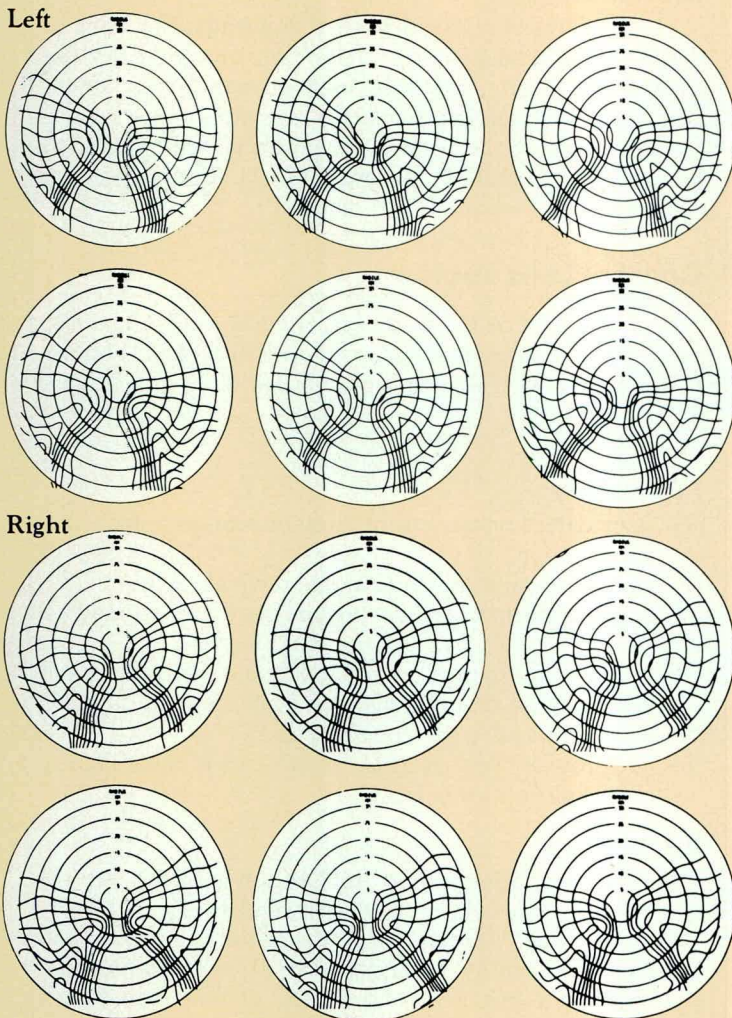
Inconsistencies like these can cause problems in dispensing. If a "pair" of lenses aren't alike you may have trouble with fitting and with adaptation, especially on your more demanding patients.

Maybe you should look for a more reliable progressive, like the one at right . . .

*Twelve Multi-Optics Varilux 2 and twelve Sola VIP lenses were obtained from ordinary shelf stock. The lenses were all surfaced to a plano distance, +2.00D near add. Using a standard measuring device the data was processed by a computer and the computer then plotted the surface astigmatism of each lens so the results could be analyzed.

The first contour line plotted, bordering the distance, intermediate and near vision zones denote astigmatism of about 0.50D or more. Each succeeding contour line marks an increase of 0.50D of astigmatism.

next pair of progressives, you should see.



12 "identical" Sola VIP lenses.

**We hate to be blunt
but the situation
here is a
whole lot better.**

Here's the progressive you don't have to worry about . . . the consistent and reliable Sola VIP.™

These are 12 "identical"* Sola VIP lenses.

Just like the other brand, their lensmeter results were the same: plano distance, +2 add.

But unlike the other brand, the computer-generated contour maps of VIP lenses *all look alike*.

All the nears are extra-large, and the intermediates leave ample room for easy fitting. The shapes are all the same, too, with gently changing curves to minimize peripheral distortion.

In every lens.

This consistent design allows consistently successful dispensing. Without mis-fittings and endless follow-ups. Without worry or wasted time – for you or your patients.

So before you order your next progressives, remember what you saw here. The lens you can rely on is Sola VIP.



SECTIONS

held in conjunction with the Biennial Congress of the Canadian Association of Optometrists.

Section 3

Special meetings of the Section may be called by the Chairperson upon arrival of the Council, at such time and place as the Council may determine.

Section 4

The members of the Section present at any meeting shall constitute a quorum for the transaction of business.

Section 5

All binding action of the Section shall be by a majority vote of the members present. Each member of the Section who is not a student member of the Association shall be entitled to vote on any matter coming before the Section. Those members of the Section who are student members of the Association shall be considered as a group for purposes of voting and therefore entitled to one vote on any matter coming before the Section.

Section 6

Except as may be otherwise required by the Constitution or Bylaws of this Association or of the Section, all meetings shall be governed by the parliamentary rules and usages contained in the then current edition of the Beauchesne's Parliamentary Rules and Forms.

Article VIII

Miscellaneous Provisions

Section 1

The fiscal year of the Section shall be the same as that of the Canadian Association of Optometrists.

Section 2

All bills incurred by the Section, before being forwarded to the office of the Canadian Association of Optometrists for payment, shall be approved by the Chairperson or the Secretary, or if the Council shall so direct, by both of them.

Section 3

No salary or compensation shall be paid to any officer, council member, or member of a committee.

Section 4

Any action of this Section must be approved by the Canadian Association of Optometrists before the same becomes effective as the action of the Canadian Association of Optometrists. Any resolutions adopted by the Section shall be reported by the Chairperson of the Section to the Council of the Canadian Association of Optometrists for the Association's approval and recommendation.

Section 5

These Bylaws shall become effective upon approval thereof of the Council of the Canadian Association of Optometrists.

Section 6

All printing for this Section or for the Council or any committee of the Section shall be done under the supervision

of the headquarters office of the Canadian Association of Optometrists.

Article IX

Amendments

Section 1

These Bylaws may be amended at any Annual Meeting of the Section by a majority vote of the members of the Section present and voting, provided such proposed amendment shall first have been approved by a majority of the Council and providing, further, that no amendment so adopted shall become effective until approved by the Council of the Canadian Association of Optometrists.

Contact Lens Section

During the C.A.O. Congress, Regina, July 4, 1985, participants expressed interest in establishing a Contact Lens Section. This section is established under the C.A.O. By-law #52.

I Objectives

- (1) to provide a means for the communication of technical information.
- (2) to develop an intra-professional referral registry.
- (3) to provide a means of sharing information (case reports, etc.).
- (4) to establish a speakers roster in the contact lens field and also establish criteria for rating such speakers.
- (5) to act as an advisory body to C.A.O.
- (6) to provide the general public with information regarding contact lenses.

II Scope

The scope and purpose of this Section is to enhance the contact lens care and services provided to the public by C.A.O. member optometrists; to promote, advance and enhance the identity of Optometry as a profession and optometrists as professional providers of contact lens care; and to provide a forum for members of the C.A.O. having an interest in the area of contact lens care.

III Functions

The functions of this Section shall include:

- (1) promoting the sharing and dissemination of information by published articles in *The Canadian Journal of Optometry*, by news bulletins and educational seminars at section meetings.
- (2) the development of a registry for intra-professional referral.
- (3) the development of a speakers roster.
- (4) the development of a C.A.O. policy statement on contact lenses.
- (5) acting as an advisory body to C.A.O.
- (6) to perform any other functions as may be directed by C.A.O. Council.

SECTIONS

IV Rules

- (1) Officers of this Section shall be a chairperson, chairperson elect, and secretary-treasurer.
- (2) Officers will be elected every two years at the C.A.O. Biennial Convention by the members of the Section who are present.
- (3) The by-laws for this Section shall be approved at the next C.A.O. Biennial Convention by the members of the Section who are present.
- (4) Membership is open to anyone who:
 - (a) is a member in good standing of C.A.O.
 - (b) pays the initial registration fee of \$25.00.
 - (c) pays the annual dues as decided by the Executive.
- (5) All activities undertaken on behalf of this Section shall be approved by the executive committee of this Section.

Section Update: Aviation Vision

CAO Secretary Treasurer and Councillor for BC, Dr. Tom Adamack, recently submitted to CAO proposed Terms of Reference for a CAO Section on Aviation Vision. Council will examine the proposal at its Summer, 1986 meeting, slated for mid-June in Vancouver. The September, 1986 issue of the CJO, assuming approval of the Terms of Reference, will present them in this Section.

The following application form is designed for those members of CAO who wish to apply for membership in any of the currently approved Sections of the Association. Elsewhere in this issue is a Section status update.

Please ensure that the completed form (i) clearly identifies the Section for which you wish to apply (If for more than one Section, please use a separate form for each); (ii) fulfills the terms for membership in the Section.

If you wish information about any of the approved Sections of the Canadian Association of Optometrists, please contact the national Association at the address given on the form.

**The Canadian Association of Optometrists
— Application for Section Membership —**

I would like to apply for membership in CAO's _____ Section
(Approved Sections as at June '86: Children's Vision; Sports Vision; Contact Lenses)

NAME: _____

MAILING ADDRESS: _____

Postal Code

Telephone

I am a member of the Canadian Association of Optometrists.

(If an application fee is required by the Section for which you are applying as indicated in the Terms of Reference, please ensure that it is enclosed with your completed form).

Return this form to: CAO, Suite 207-77 Metcalfe Street, Ottawa, Ontario. K1P 5L6

(Signed)

(Date)

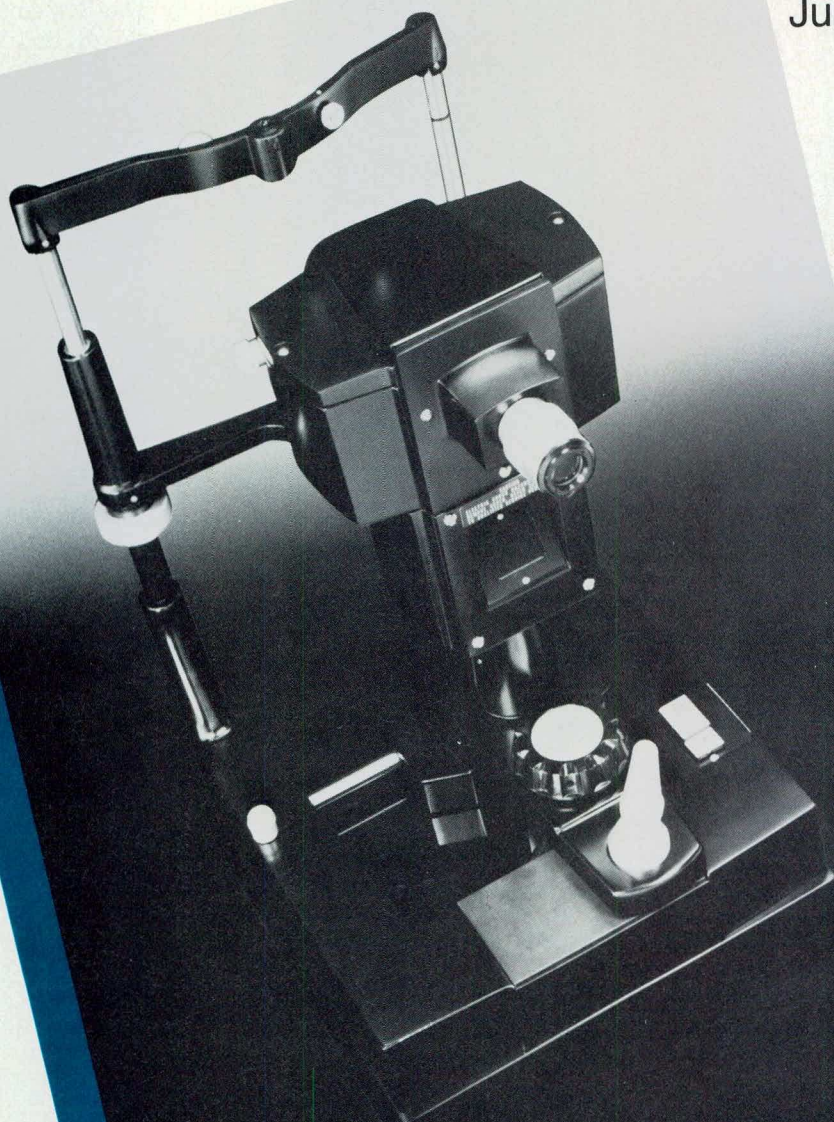
Reichert

NON-CONTACT™ II
TONOMETER

BEST DEAL EVER!

Special Offer now
available from
June 1st-October 1st, 1986

- **FAST**
- **ACCURATE**
- **NO
CONTAMINATION**



For Special Offer Details
Contact Your Local Distributor or Call Us

Reichert

Ophthalmic Instruments
P.O. Box 39, Belleville, Ont. K8N 4Z9
(613) 466-8210

COMMUNIQUE

(continued from page 72)

of the national Association's policy with respect to surveys, as well as to request a copy of the finished survey. (According to Schema's President, the survey was not being conducted for any one particular client.)

On February 28th, Schema sent another questionnaire to all those Canadian OD's who had not yet returned the first. In a cover letter sent with the second questionnaire, Schema stated, "The Canadian Association of Optometrists has requested the information when the study is completed and your cooperation will help ensure that the data gives a true and accurate representation of trends in Optometry in Canada."

The implied endorsement of, in the first instance, the various provincial optometric Associations and, in the second, CAO, is erroneous. Although CAO has requested a copy of the tabulated results, neither CAO nor the provincial Associations of Optometry have endorsed the Schema survey.

CAO Pamphlet Sales Top Quarter Million!

In only three short months, sales of CAO's new series of English language pamphlets have topped the quarter million mark, and that in only nine Canadian provinces. (An agreement with l'Association des Optométristes du Québec does not include that province's OD's on the distribution list for the new series, which is a translation of an existing AOQ pamphlet series.)

Ontario OD's lead the way, with a total of just over 95,000 pamphlets ordered, followed by Alberta (45,400); Saskatchewan (23,350); British Columbia (22,600); Manitoba (15,200); Nova Scotia (14,600); New Brunswick (12,100); Newfoundland (10,800) and Prince Edward Island (1,700).

An order form for the eight new pamphlets was included in the March, 1986 issue of *The Canadian Journal of Optometry*.

CAO Gets Two Video PSA's for the Price of One

Following the January 28th explosion of the NASA shuttle *Challenger*, CAO had to re-evaluate its planned video Public Service Announcement being produced for Save Your Vision Week, 1986.

Originally, a PSA had been planned to include footage taken outside the shuttle on one of the missions involving EVA (Extra Vehicular Activity), reflecting the tie-in to Marc Garneau as Canada's first astronaut and Honorary Chairperson for Save Your Vision Week 1986. The *Challenger* disaster, however, resulted in a suspension of those plans and a fresh script was drawn up incorporating a number of Canadian scenes from across the country.

Viewers who have seen the PSA will not know that this is, in fact, one of two PSA's developed by CAO during the time originally budgeted for the Save Your Vision Week production schedule. It was felt by all concerned that the NASA footage was simply too

beautiful to abandon and a second PSA was produced using it, and the Save Your Vision Week theme, "Life is Worth Seeing!"

Following the next successful shuttle mission, CAO will release the second PSA to Canadian TV stations, in effect a completely new video campaign for the cost of duplicating and mailing.

RK Report Featured in Latest Communiqué

An eight-page report on Radial Keratotomy, drawn from the US publication *Optometric Management*, was featured in the latest issue of the *CAO Communiqué*.

Unquestionably, the issue of experimental surgery on a healthy organ is a hotly discussed topic in the US, as evidenced by the material in this article. Optometrists appear, for the most part, to be taking the position of learning as much as is known about RK and passing along the facts, as well as the pro and con opinions, to any patients making enquiries.

The US Air Force, meanwhile, is not so ambivalent. Current Air Force regulations expressly prohibit enlistment of anyone who has undergone RK surgery, be it for active duty, reserve or national guard status or admission to the Air Force Academy in Colorado Springs. In addition, any current active duty personnel who undergo the surgery will immediately have their flight status revoked.

Established Practice For Sale

Planning Retirement. Wonderful opportunity in a stable economic area. Reasonable asking price. Write or phone:

Dr. F.C. Potter
P.O. Box 1600
Rosetown, Sask. (306) 882-3511 (O)
SOL 2V0 882-2494 (R)

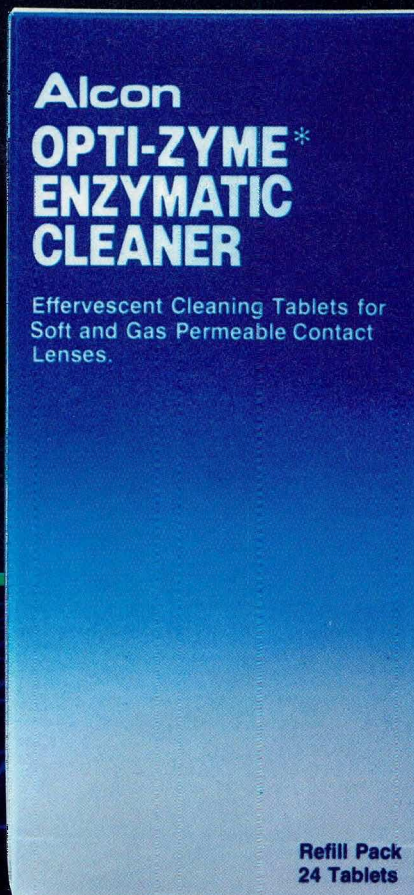
ASSOCIATE WANTED

Optometrist seeking Associate to take over suburban practice during maternity leave. Definite long-term possibilities.

For details, please contact:

Box 486J
The Canadian Journal of Optometry
Suite 207 — 77 Metcalfe Street
Ottawa, Ontario
K1P 5L6

OPTI-ZYME* AN ENZYMATIC CLEANER THAT REALLY CLEANS



WITHOUT PAPAIN SENSITIVITY

Clinical studies prove Opti-Zyme's unique cleansing action to be highly effective...in fact, Opti-Zyme is the only enzymatic cleaner that removes protein, lipid and mucin deposits.

Odorless and in convenient tablet form, Opti-Zyme dissolves in any saline solution in just two minutes...and cleans lenses completely in 2 to 4 hours without the risk of papain sensitivity.

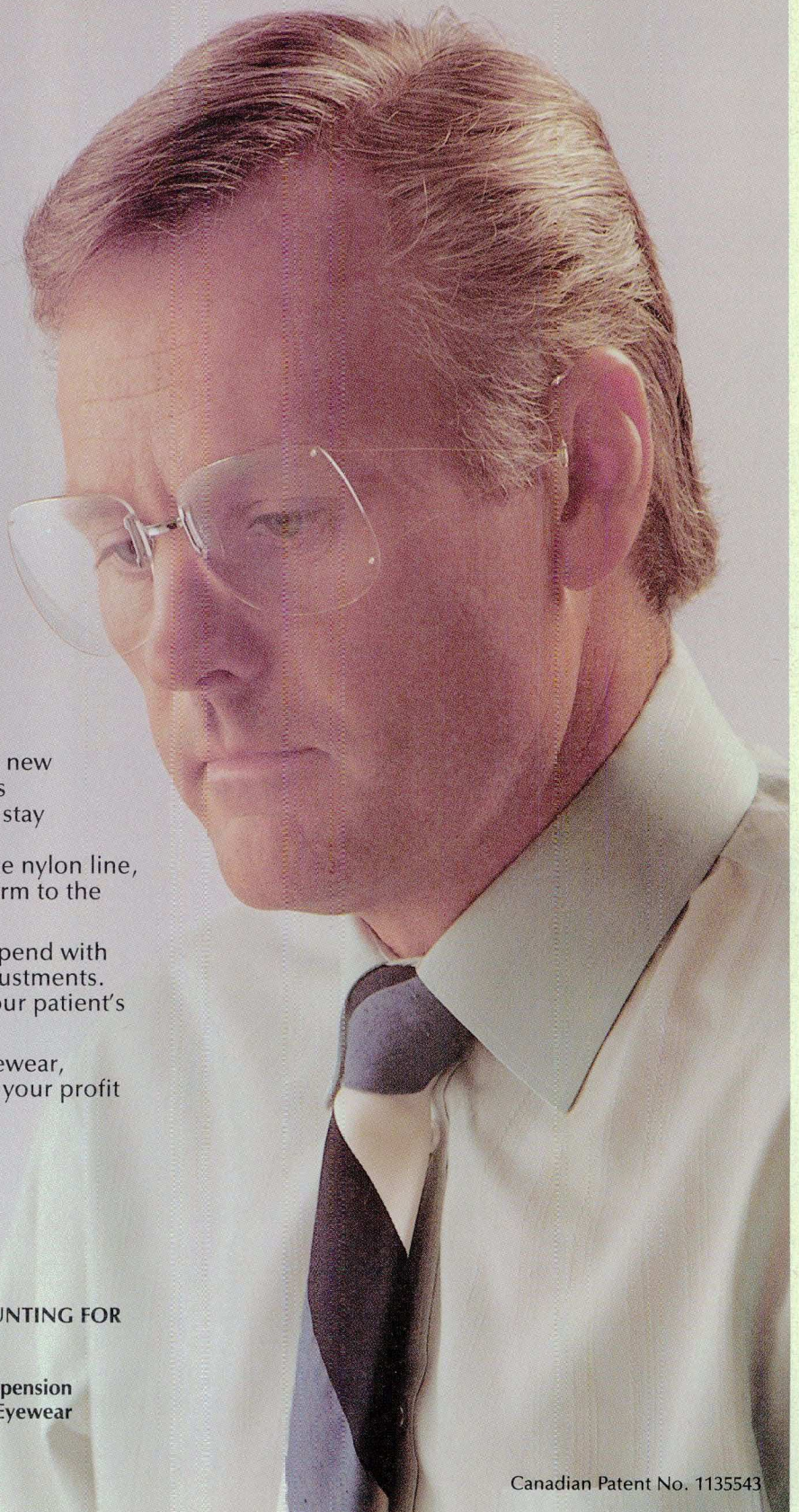
**Alcon Opti-Zyme Enzymatic Cleaner,
ideal for ALL soft (including extended wear lenses) and gas permeable contact lenses**



Alcon Canada Inc.
Toronto, Ontario L5N 2B8

*registered trade mark Alcon Canada Inc.

What's missing in this picture?

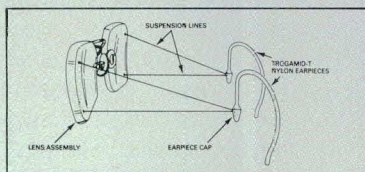


What's missing are ordinary glasses that slip and slide, that pinch at the nose and the ears and hurt on the side of the head.

Suspension Eyewear[®] is a completely new technology in eyewear. These glasses weigh less than ordinary glasses and stay in place better because they're held securely by sturdy, yet nearly invisible nylon line, and Trogamid-T earpieces that conform to the contours of the ears.

What else is missing? The time you spend with ordinary glasses making periodic adjustments. Once Suspension Eyewear is fit to your patient's satisfaction, it stays fit.

If you're not carrying Suspension Eyewear, something is definitely missing from your profit picture.



FOR A FREE SUSPENSION EYEWEAR MOUNTING FOR YOU AND YOUR STAFF, CALL NOW!

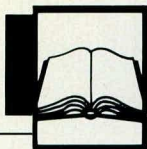
Lunettes
Suspendues

CANSEE

Suspension
Eyewear

1-800-661-1165

Canadian Patent No. 1135543



BOOK REVIEWS

Defective Colour Vision: Fundamentals, Diagnosis and Management

Defective Colour Vision: Fundamentals, Diagnosis and Management by R. Fletcher, J. Voke. Published 1985 by Adam Hilger Ltd., Boston and Bristol. 610 pp., \$67.50 (US\$)

If any one aspect of physiological optics tends to be neglected by practitioners or, indeed, to arouse even a minimal interest, that topic is colour vision. *Defective Colour Vision*, by two world renowned authorities in the field, will go a long way, however, towards changing attitudes about the importance of an awareness of the complex aspects of colour vision in the optometric practice.

This text, in fact, should become a standard undergraduate text if optometrists are to live up to their reputation as experts in primary vision and eye care. The book contains a wealth of information on retinal anatomy (both structural and functional), on the anomalies of colour vision and their specific characteristics and on the diverse clinical interpretations and applications of colour, all of which should lead to the formation of more astute optometric clinicians and counsellors. The book, too, in a more general sense, will increase a practitioner's appreciation of colour vision and its role in society.

As one reads the work, one realizes that it must have been a labour of love and a very demanding challenge for the authors to wade through more than 1,000 references in order to be able to synthesize the information before producing such a concise presentation of the material.

The book is well-written and well-illustrated. The reader will find, initially, that some chapters do not seem to flow as well as others, because of the nature of the subject matter discussed. The information in these chapters is so condensed that a complete reading is a bit laborious. Other chapters, however, flow like those of a novel. This is not a defect, but rather results from the very nature of the subjects. Retinal physiology, for example, is a far more complex topic than colour coding in industry.

Readers will also agree with the authors that the book can be looked at not only as a whole, but also as a collection of independent studies (chapters), each of which can be treated individually if just one particular aspect of colour vision needs to be reviewed.

There are fourteen chapters covering some 516 pages, to which is added an appendix of 14 pages, a reference list of over 1,000 names, filling some 61 pages and an index of authors and topics, each of eight pages. At first glance, a reader might ask why not references after each chapter, as is common in some other academic works? As it turns out, this would be a significantly repetitive exercise, as some references recur in several different chapters. The single alphabetical list at the end, in fact, provides a bonus, a ready bibliography of almost everything of importance which has been written on colour vision.

Although it would be interesting to offer summaries of each chapter, this is not the goal of this review. Suffice to say

that the titles of each chapter have been selected with care. Moreover, the Table of Contents is detailed and one can quickly find the location of any one aspect desired. The Chapter titles' however, follows so that the readers of this review may note the thoroughness with which the authors have addressed the topic.

How Colours Are Seen — Retinal Anatomy and Physiology
 Colour Measurements and Specifications
 Inherited Colour Deficiencies
 Acquired Defects
 An Approach to Testing
 Illumination for Colour Vision Tests
 Detection and Diagnosis
 Interpretation of Records
 Assistance for Colour Vision Defects (Filters, etc.)
 Daltonic Child
 Vocational and Industrial Aspects
 Safety Aspects
 Official Colour Vision Standards in the UK
 Recommendations

An optometric vision care practitioner is expected to understand any vision problem with which a patient may present. But he or she must also have the methods or knowledge to analyse and diagnose the condition, as well as to treat it and to counsel the patient. This book enables the practitioner to do exactly this, as indicated in its sub-title, "Fundamentals, Diagnosis and Management".

With the increasing importance of colour in our modern world, practitioners cannot ignore the topic, neither can they continue to get by on only a minimal awareness of its myriad complexities. Reading this book is a most effective method for the practitioner to upgrade one's knowledge of colour vision. Need more be said?

Cataract Surgery, A.D. Steele, R.C. Drews, Editors. From the *Ophthalmology 2 Series*, published 1984 by Butterworth International Medical Reviews.

Cataract Surgery is exactly as the preface states, "Not a didactic text", but rather a work which, through different contributors, presents views on all aspects of cataract surgery. This gives the book both its charms and its principal drawbacks. There is, inevitably, duplication, contradiction and poor continuity in terms of style. A chapter on prostoglandins in cataract surgery, for example, sends one scurrying back to the biochemistry books, whereas the chapter on E.C.C.E. appears to be a collection of lecture handouts, and is best read recipe fashion with a prepared eye at the ready... ("Insert Tab A into Slot B. Please avoid digging into the anterior cortical face.")

"Optical Management of Aphakia" centres on both AC and PC intraocular lenses and is fairly exhaustive. A chapter on newer refractive keratoplastic techniques is also of special interest. The chapter on contact lens correction is naturally oversimplified. There is no mention whatsoever of spectacle correction or of the frequently encountered distorted pupils

BOOK REVIEWS

or optical problems associated with unilateral astigmatic corrections.

This is, of course, a text aimed at the surgical community and I'm sure it will prompt many a lunchtime debate over techniques and strategies. As a pure reference text, however, it remains too vague and disorganized.

Keeping in mind the trend towards cataract surgery's becoming an "in-office" procedure, this text may soon become mandatory. However, for this practitioner, it is merely a useful adjunct and not an essential part of the optometric library.

Dr. J. Tripp
Ottawa, ON

Reading Disabilities

Reading Disabilities: *The Interaction of Reading, Language and Neuropsychological Deficits.* D.G. Doehring, R.L. Trites, R.G. Patel and C.M. Fiedorowicz. Academic Press, New York, 1981. 280pp.

Ce travail a été publié alors que D. Doehring et C. Fiedorowicz étaient professeurs à l'Université McGill. Les auteurs expliquent d'abord les concepts récents ayant trait aux troubles d'apprentissage de la lecture. Ils décrivent ensuite une méthode objective qui permet de classer les individus ayant des troubles d'apprentissage de la lecture en sous-types. La classification a été faite au moyen d'une analyse factorielle (technique Q) qui est décrite dans les chapitres 5 et 6. Le programme SPSS contient des informations utiles pour le lecteur désireux d'utiliser cette technique. La technique Q permet de déterminer si les individus d'un groupe sont différents à partir d'un ensemble de résultats obtenus dans une série de tests.

Trois types d'individus ayant des troubles d'apprentissage ont été observés. Le type A présente un trouble d'association entre différentes modalités sensorielles, le type O manifeste surtout des lacunes en lecture orale, alors que le type S est caractérisé par des anomalies de séquence. Selon les auteurs, ces trois sous-types décrivent 72 (82%) des 88 sujets de l'échantillon qui présentent des troubles de lecture. Cette classification a été obtenue à partir de 39 tests différents.

Les résultats d'une analyse factorielle peuvent être interprétés de plusieurs façons. D'abord on obtient des résultats en fonction des tests qui ont été inclus dans la batterie de tests, ce qui est arbitraire au départ. De plus la saturation en facteurs qui constitue le point de démarcation qui permet de classer l'échantillon est aussi arbitraire. Les auteurs ont choisi la valeur de 0.40 qui leur a permis de classer 82% de leur échantillon. Ils auraient pu classer 69% de l'échantillon s'ils avaient choisi 0.50 et 41% de l'échantillon s'ils avaient choisi 0.60. Une valeur de 0.60 équivaut à un coefficient de détermination de 36 ($d = 36$) c'est-à-dire que le facteur explique 36% de la variance totale; les sous-types purs n'apparaissent pas en dessous de cette valeur. Le choix des tests et le critère étant arbitraires, la classification des sous-types l'est aussi.

Le type S serait susceptible d'intéresser plus particulièrement un spécialiste de la vision étant donné que le sujet peut percevoir très bien des lettres séparées mais ne peut analyser

un ensemble de lettres (visual matching, visual scanning, auditory-visual matching). Il semble toutefois que les auteurs aient présenté les tests dans lesquels la performance des types S est la meilleure au début de la séquence de tests et les tests dans lesquels leur performance est la moins bonne à la fin de la séquence. Le type S a pu apparaître à cause de la fatigue accumulée pendant la séance de tests; le phénomène est d'autant plus possible que les enfants qui présentent des troubles de lecture sont plus faciles à distraire.

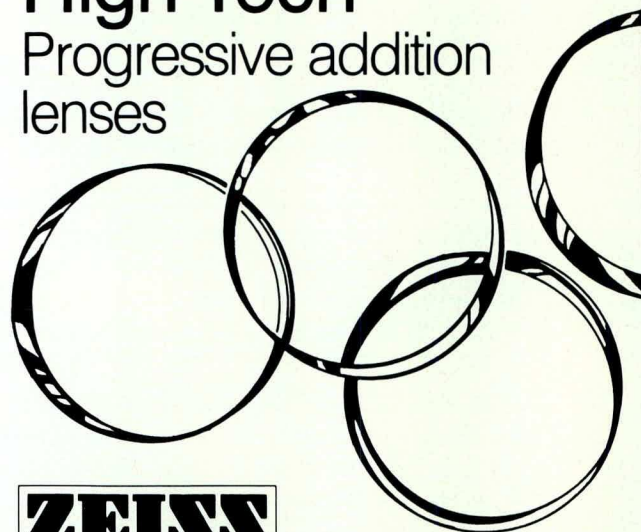
S'il était possible d'obtenir une telle classification à partir d'un échantillon plus nombreux et plus diversifié, des méthodes de traitement différentes pourraient être utilisées en fonction des types d'anomalies. Ainsi le type S, s'il existe, pourrait éventuellement subir un entraînement de mouvements oculaires de saccades, de poursuite et de vergence qui serait moins efficace pour les types O et A. Ce volume est susceptible d'intéresser les spécialistes de la vision qui tentent de traiter les problèmes d'apprentissage de la lecture en autant qu'ils possèdent des notions de base sur l'analyse factorielle.

Jacques Létourneau, Ph.D.
Professeur titulaire
Ecole d'Optométrie
Université de Montréal

Gradal HS

High-Tech

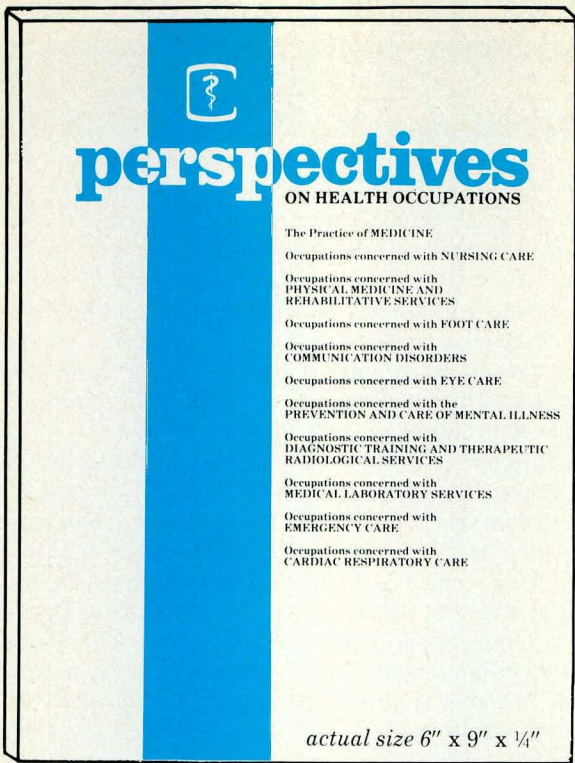
Progressive addition lenses



ZEISS

West Germany

Carl Zeiss
Canada Ltd/Ltée
416/449-4660



The Health Care Team: **WHERE DO YOU FIT IN?**

Perspectives on Health Occupations

A new reference guide for Health Professionals who work with other Health Professionals.

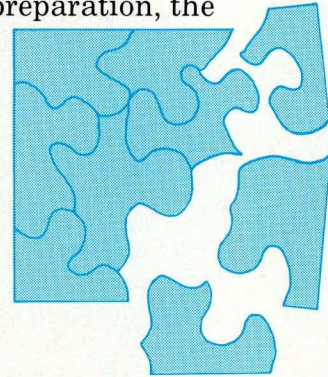
The title page sample shown gives an idea of the wide range of occupations covered by this invaluable text.

"Perspectives on Health Occupations" compiles the most expansive overview of health care occupations ever taken in Canada. The content focuses on the professional inter-relationships of the members of the health care team.

Descriptions of each health occupation include educational preparation, the occupation's perspective on its scope of practice and a medical perspective, including recommendations for improving patient care.

Anyone interested in health-related occupations will find in *"Perspectives on Health Occupations"* a detailed description of the various components of the health care delivery system.

This publication will also be of value to educators, administrators and association leaders.



Chapter 6 of *Perspectives on Health Occupations* discusses in detail the inter-relationships between all those concerned with providing Canadians with medical and non-medical eye care. It is a valuable reference work for both practitioners and educators. If you would like to have additional information please write to the address below.

Take advantage of this pre-publication offer and save 25% on the price of your copy. Regular price is \$12.00 per copy. Orders placed before July 1, 1986—\$9.00 per copy. Orders for 10 or more copies delivered to the same address—\$9.00 per copy.

To:
Canadian Medical Association
Box 8650
OTTAWA, Ontario
K1G 0G8

Ship To:
Name: _____

Address: _____

Please send me _____ copies of
Perspectives on Health Occupations
@ \$ _____ each TOTAL \$ _____

City _____ Prov. _____

(Cheque or money order must be included)

Postal Code _____

8TH MONTREAL INTERNATIONAL SYMPOSIUM ON CONTACT LENSES

The Queen Elisabeth Hotel
October 11-12th, 1986

SIMULTANEOUS TRANSLATION
STATE BOARD APPROVED
A.O.A. CREDIT CATEGORY 1 ORA

Montréal is the focal point of the economic and artistic activity of the province of Quebec. You will find a multitude of activities and sites to visit. Its restaurants are world reknownned. Montreal, a place to be greeted!

SPEAKERS

Dr Howard Backman, O.D. Quebec
Dr W.J. Benjamin, O.D., Ph.D. Texas
Dr Murcheson Callender, O.D., M.Sc. Ontario
Dr Desmond Fonn, O.D. South Africa
Dr Theo F. Gumpelmayer, O.D., Ph.D. Austria
Dr Anthony J. Hanks, O.D. Australia
Dr Richard M. Hill, O.D., Ph.D. Ohio
Dr Marvin Kwitko, M.D. Quebec
Dr Robert Morrison, O.D. Pennsylvania
Dr Joel Silbert, O.D. Pennsylvania

TOPICS

- Fitting of soft toric and bifocal lenses
- Radial keratotomy
- Diseases that contra-indicate the wear of contact lenses
- The future of hard, soft and extended wear lenses
- Etc...



REGISTRATION FORM

Please send me my special rate room reservation card from the Queen Elisabeth Hotel
 Yes, I will attend the Montreal Symposium on October 11, 12th 1986.

Symposium

ADVANCED REGISTRATION \$150 cdn
 AFTER SEPTEMBER 1st \$170 cdn

Exhibit Visit Only \$25 cdn

Enclosed is my check for _____

Name _____

Address _____

City _____ State, Prov. _____ Zip _____



Quebec
Optometric
Association



Quebec Optometric
Association

465, rue St-Jean, bureau 1003
Montréal, Qué. H2Y 2R6 / (514) 849-8051

EXPO '86 ACCOMMODATION

Bed and Breakfast
Close to Expo '86 Site
(by Mother-in-Law of a BC OD)

Information: Ms. Elsie Balluff
27 West 19th Avenue
Vancouver, BC
V5Y 2B3

Telephone: (604) 876-3537

WELL-ESTABLISHED PRACTICE FOR SALE

in the Okanagan Valley of British Columbia

Optometrist Planning Retirement

Reply in confidence to:
Box 286J
The Canadian Journal of Optometry
Suite 207 — 77 Metcalfe Street
Ottawa, Ontario
K1P 5L6

OPTOMETRIST

A well-established, member-owned co-operative Clinic requires an Optometrist to join two others in the team approach to preventive health care.

This is a salaried position offering good remuneration, excellent fringe benefit package.

Please reply, with curriculum vitae to:

Dr. D.A. McKillop
Optometry Department
Saskatoon Community Clinic
455 Second Avenue North
Saskatoon, Saskatchewan
S7K 2C2

Optometrists Wanted

For Newfoundland and Prince Edward Island. Instant practice for the right person. Please write, giving qualifications, experience and personal resumé to:

Box 186M
Canadian Journal of Optometry
Suite 207, 77 Metcalfe Street
Ottawa, Ontario
K1P 5L6

All inquiries held in strictest confidence.

**20th Biennial Congress
of the
Canadian Association of Optometrists**

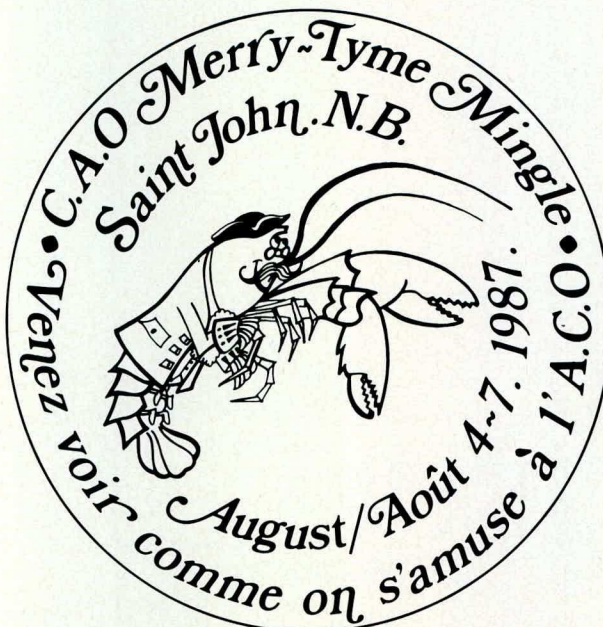


**20^{ème} Congrès Biennal
de
l'Association Canadienne des Optométristes**

August 4-7 août 1987

WELCOME!

The New Brunswick Association of Optometrists cordially invites all Canadian Optometrists and their families to Saint John for an exciting and unique vacation and a very special twentieth biennial Congress.



BIENVENUE!

L'Association des Optométristes du Nouveau-Brunswick invite tous les Optométristes Canadiens ainsi que leurs familles à se rendre à Saint-Jean pour une vacance unique et un congrès avec un cachet particulier, le 20^{ème} Congrès biennal.

What's missing in the perfect saline?

Preservatives.

Preservatives cause irritation.
Because New Lens Plus
contains no preservatives, only
pure saline,
you can be sure your contact
lens wearers enjoy irritation-free eyes.
At a price they can afford.



NEW

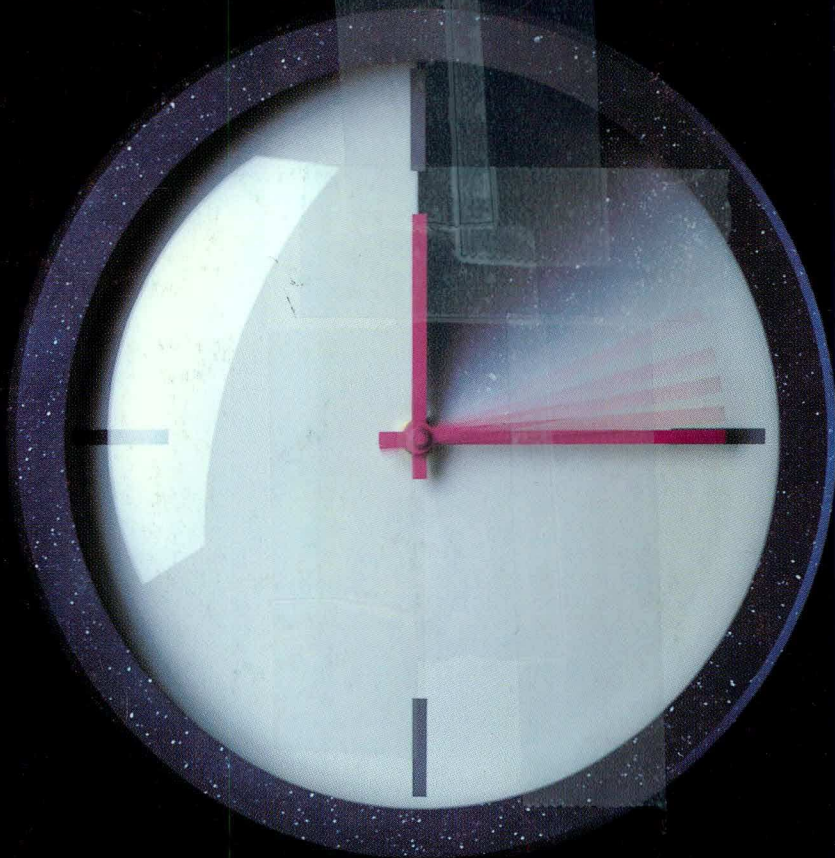
LENS PLUS™

recommend perfection.

Allergan Inc.
SCIENCE WITH VISION

ULTRAZYME

Protein remover tablets



ONE STEP CONVENIENCE

EFFECTIVE PROTEIN REMOVAL

ULTRAZYME is a unique naturally derived enzyme (Subtilisin-A) that effectively removes protein deposits from all soft contact lenses including high water and extended wear.

ULTRAZYME IS SAFE

ULTRAZYME has a large molecular structure with unique non-binding properties. This formulation is non-irritating, providing safe, comfortable lens wear, even when lenses are soaked overnight.

ULTRAZYME IS CONVENIENT

ULTRAZYME is a one-tablet system which simplifies the lens care regimen. A single tablet used weekly for 15 minutes will remove protein deposits from two lenses.

A SIMPLE COMBINATION

Unique ULTRAZYME and Oxysept 1* work together synergistically. The result of this combination is improved protein removal and disinfection.

*ULTRAZYME can be used with all hydrogen peroxide systems with the exception of AOsept.



ALLERGAN

SCIENCE WITH VISION