Doing the Glaucoma thing in Practice

NZAO 2015

PATERSON BURN
OPTOMETRISTS

Doing the Glaucoma Thing - Glaucoma Guidelines

- My Role
  - Convenor of Glaucoma Working Party
- History
  - HWNZ Review – doubling of services by 2020 with only 40% increase in funding
  - Optometrists have the training to provide more advanced care
  - Recommendation that Optometrists become authorised prescribers and manage glaucoma under guidelines developed by ODOB
  - Broad discretion given to Board to develop guidelines that result in accessible and safe practice in treatment of glaucoma
  - Medicines Act altered in 2014 with guidelines published shortly after.

Glaucoma Guidelines – Desired Outcome

- To develop a framework that will work for all NZ whether in a large city or remote rural area.
- Only those who have a real interest in treatment of glaucoma should seek to treat independently
  - Need to manage a reasonable number of patients to gain experience
  - 20 hours of clinical practice or 5 collaborative care cases
    - 20 hours clinical practice requires evidence of reasonable patient contact (log)
  - Peer review requirements
- To be able to work within ‘vocational scope’
  - Can manage within comfort levels – as experience develops can manage more complicated cases

Glaucoma Guidelines Development

- Working Party of 5 representative members convened in 2012
  - 2 Board members including convenor
  - 1 nominated by NZAO
  - 1 nominated by DOVS
  - 1 optometrist that works closely with ophthalmology
- Option of starting from scratch or using existing guidelines
  - Assessed NICE and NHMRC guidelines
  - NHMRC used and modified with additional guidelines to adapt for NZ to be used with independence. British Columbia have done this already and we used their statement as a starting point.
- Precedent – Glaucoma prescribing by Optometrists only in U.S., Canada and Australia
- 2 separate consultations
  - Lots of submissions – diverse range of views
- Multiple Stakeholder Meetings
  - Several each with RANZCO, NZAO and HWNZ/MoH
- Desire to maintain and build relationships with Ophthalmology

NHMRC Guidelines

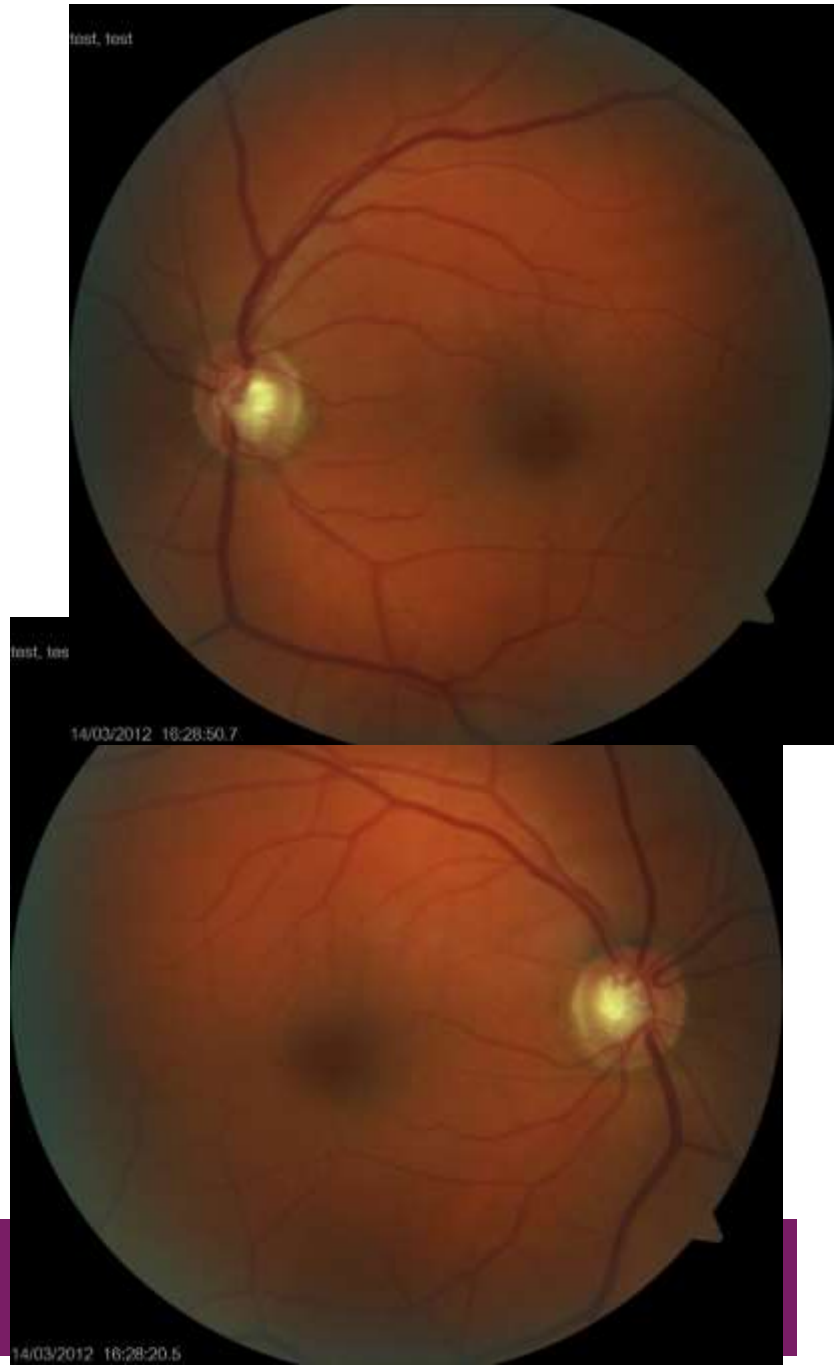
- Developed by National Health and Medical Research Council for the Australian Government
  - Literature Review
    - Secondary evidence was the literature of choice – comprised primarily of systematic reviews
    - Where there was a lack of systematic reviews primary literature was sought
    - ‘Body of Evidence’ matrix used to determine the evidence base, consistency of evidence clinical impact, applicability and generalisability
    - Where the was a lack of relevant research related to a clinical question expert or consensus clinical opinion was used. The strength of evidence is clearly stated in any Evidence Statement.

NHMRC Guidelines

- Key sections on
  - Prognosis – understanding the natural history
  - Identifying those at risk of developing glaucoma
  - Diagnosis of glaucoma
  - Monitoring: long-term care
  - Medication
  - Patient journeys
- All Optometrists should read and follow these guidelines whether treating independently, collaboratively or just monitoring suspects
- Free download from NHMRC website

Example Case

- 2012 – 2 nearly identical cases seen while in the initial stages of developing glaucoma guidelines
- 62 YO male and 46yo male
- Long term patients
- Presented for routine exam (first patient)
  - Essentially unchanged except inferior rim notch noted on ophthalmoscopy
  - IOP's R 12, L 10 in 2004 increasing to R 18, L 16 in 2012



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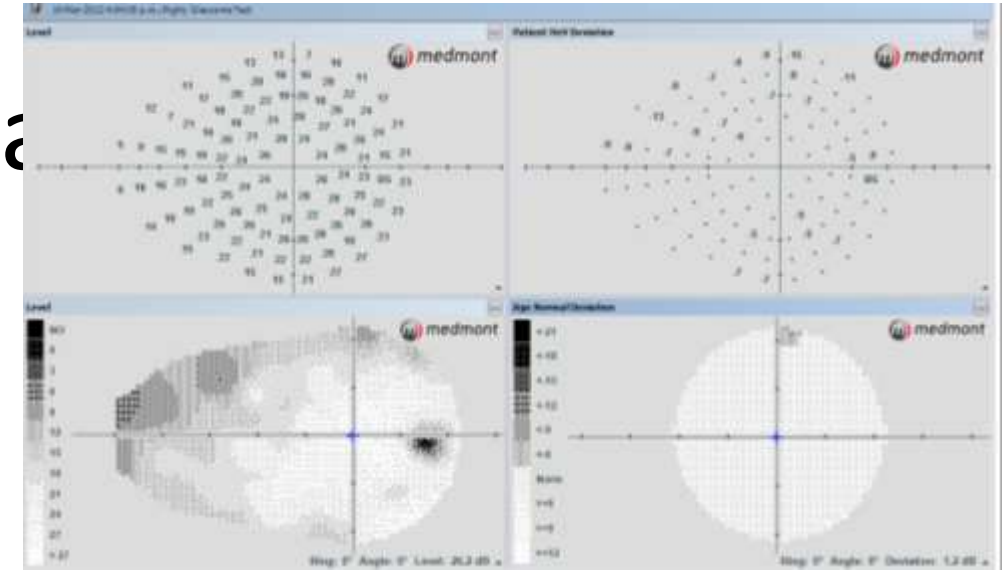
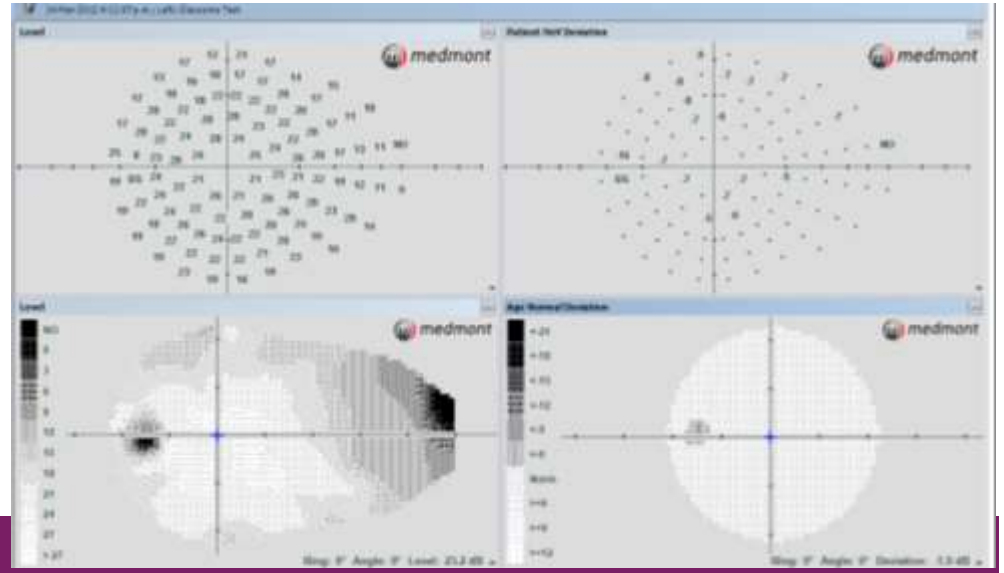
Example Ca





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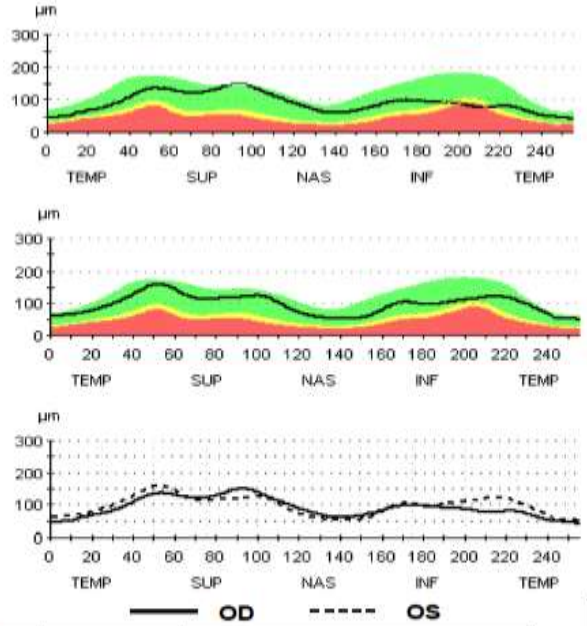
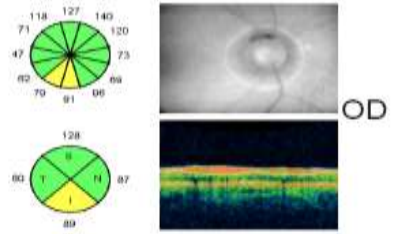
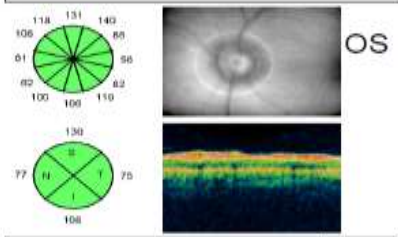
Scan Length: 10.87 mm





OD

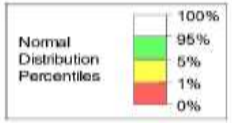
Signal Strength (Max 10)	10



OS

Signal Strength (Max 10)	10

OD	Scans used	1,2,3,
OS	Scans used	1,2,3,



	OD (N=3)	OS (N=3)	OD-OS
Imax/Smax	0.66	0.76	-0.10
Smax/Imax	1.52	1.32	0.20
Smax/Tavg	2.51	2.13	0.37
Imax/Tavg	1.65	1.62	0.03
Smax/Navg	1.71	2.08	-0.37
Max-Min	107.00	108.00	-1.00
Smax	150.00	160.00	-10.00
Imax	99.00	121.00	-22.00
Savg	128.00	130.00	-2.00
Iavg	89.00	108.00	-19.00
Avg.Thickness	91.15	97.39	-6.24

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Example Case

- Referred to WPH – pre perimetric glaucoma
  - Fields and IOP's done
  - Un-surprisingly normal – referral not accepted and not seen by specialist
  - Referred back for optometric care
  - Seen 12 months later with deterioration in OCT, wedge defect on RNFL and early field defect
- This was one of two cases that I had while developing the guidelines
  - Still caught at an early stage but clear inferior notch should have prompted treatment earlier – funding issues at local hospital prevented assessment.
  - How could these examples influence my input into the Glaucoma Guidelines?

Collaborative or Independent Care?

- Collaborative Care is a significantly more expensive model than independent care
  - Endorsing Collaborative Care alone would not satisfy the HWNZ aim of doubling health services with a 40% increase in funding by 2020.
- Glaucoma Specialists remain best placed to manage the most complicated cases of glaucoma and to do surgery/laser
- Optometrists are trained to diagnose and treat glaucoma but should do so within their 'vocational scope' of practice – Guidelines written to encourage referral until experience develops
  - An optometrist glaucoma prescriber ***is recommended to*** consult or refer to an ophthalmologist patients that:
    - are under 40 years of age at diagnosis;
    - have glaucoma secondary to any other pathology;
    - have IOP above the target pressure for more than 12 weeks;
    - require more than two concurrent classes of topical glaucoma medications to reach the target IOP;
    - have any clinically significant adverse effect from any prescribed medication;
    - demonstrates progression in accordance with NHMRC guidelines.

Glaucoma Prescribing - Independence

- All optometrists are expected to monitor those with:
  - ***No glaucomatous impairment:*** Under observation as a glaucoma suspect, however not on medication, and no glaucoma visual field defect in either eye.
- Independent prescribing does not mean practicing in isolation
  - One aim of the 20 hours/5 collaborative cases was to encourage optometrists to form a relationship with their local ophthalmologist
- The Health and Disability Commissioner Code of Rights states that patients must be fully informed, and to be able to make an informed decision. It is important that before managing glaucoma independently that an optometrist discuss all options with their patient including referral to a specialist

Collaborative Care

- Not all optometrists will want to become independent prescribers
- You do not need to be an approved glaucoma prescriber to write a prescription for glaucoma medications but you must be TPA qualified and have an agreed collaborative care relationship
- Collaborative Care Guidelines have been published for those who wish to work in a team with an ophthalmologist – need good communication
  - Once 5 cases have been completed you can apply to become a glaucoma prescriber.

Issues to address with collaborative care

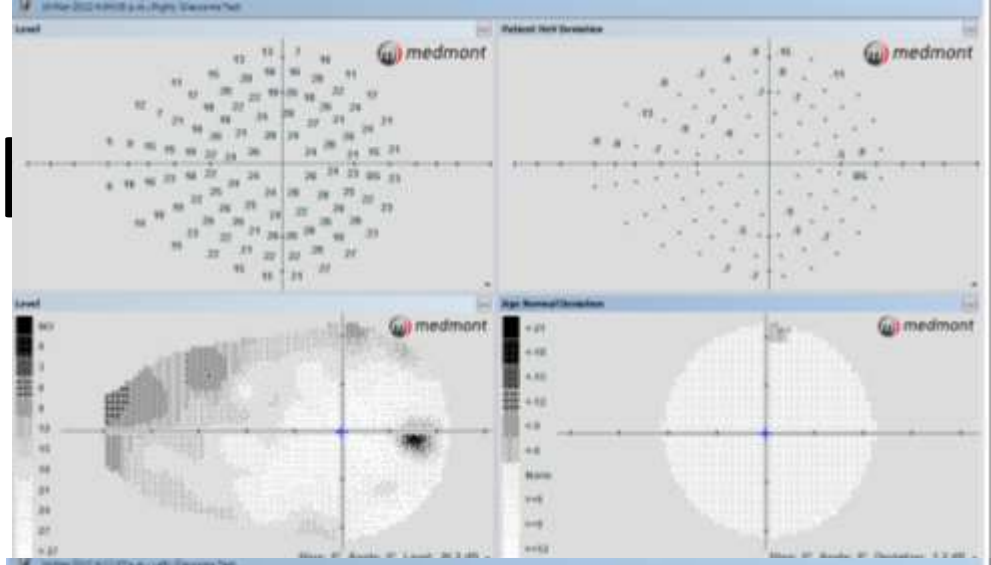
- Ophthalmologists should not be expected to do free consults
- Ethics with referrals/payment for services
- Need close working relationship and clear management plans
  - Collaborative care providers need to be willing to communicate readily with their colleagues. Ideally electronic transfer of records/letters and optic disc imaging and visual field data should be possible via secure communication but hard copy transfer is also acceptable. Referral and monitoring forms should be developed.
- Ideal to have similar equipment
  - Particularly Visual Fields - Humphrey

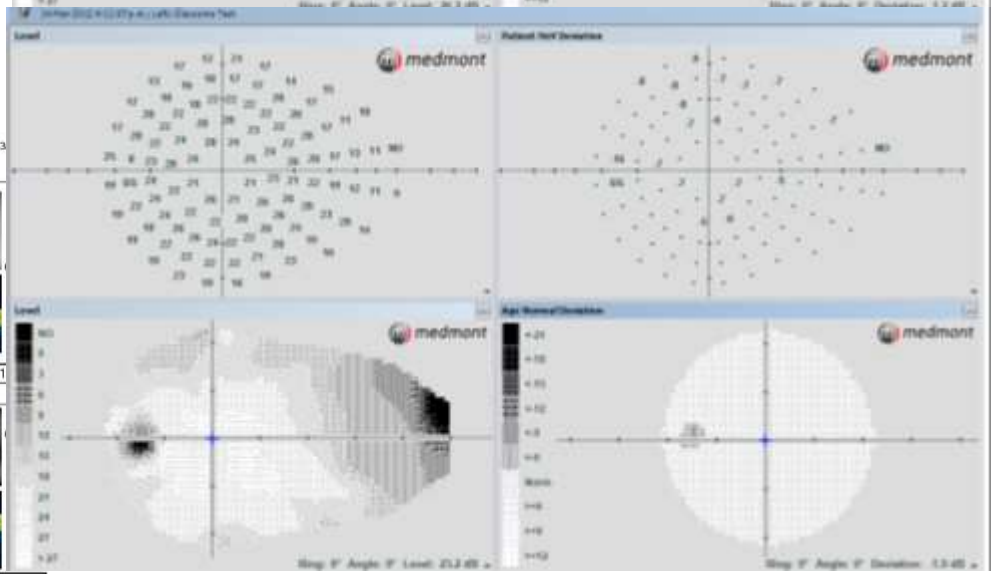
The Waikato Model

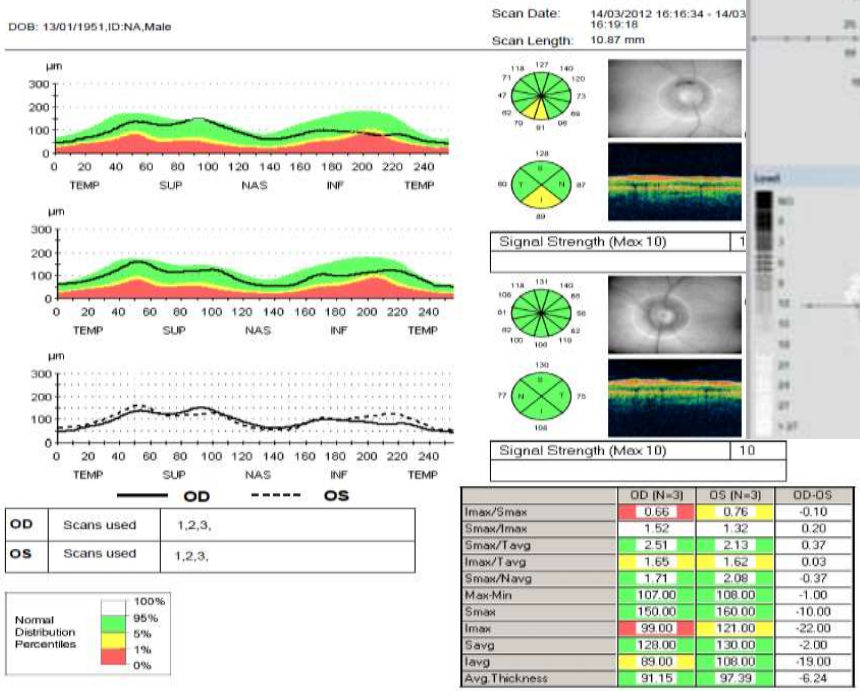
- Work in progress
- Desire to work closely with Ophthalmology
  - Meetings between optometrists from multiple practices and glaucoma specialists.
  - Regular clinic time at Waikato Hospital
- 6 monthly peer review sessions
- As experience develops more autonomy in treatment
  - Similar to Diabetic Retinopathy management.
- Full independent model in private practice
  - OCT, Humphrey fields, Perkins tonometry disc photography all important.

Back to the exampl

- How could these cases have been handled differently under new glaucoma management guidelines?
- Independent ca
- Collaborative







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What now?

- All optometrists should be monitoring glaucoma suspects
- Encourage all TPA optoms to form a collaborative care relationship with a local ophthalmologist
- Anyone with a specific interest in glaucoma should commit to the 20 clinic hours or present 5 collaborative cases to the Board to apply to become an approved glaucoma prescriber
- Richard to present his experiences having been through this process.