CORRESPONDENCE

Using the LiGHT study to adapt a glaucoma service for primary selective laser trabeculoplasty treatment

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To the Editor:

Selective laser trabeculoplasty (SLT) is a well established adjunct to medical and surgical management of ocular hypertension (OHT) and primary open angle glaucoma (POAG) [1, 2]. More recently, the LiGHT study revealed first-line SLT to be better and more cost-effective than initial management with drops [3]. However, before we can offer primary SLT to new glaucoma patients, we need to know what proportion of new glaucoma referrals are eligible for treatment and create a suitable number of new SLT appointments.

New glaucoma patients assessed over five different sites in Greater Glasgow and Clyde (GGC) between 7 January 2019 and 5 April 2019 were retrospectively reviewed. Patients meeting the LiGHT study inclusion criteria were identified and deemed suitable for primary SLT. Over the 3-month period there were 516 new glaucoma referrals. Overall, 64 patients (12.4%) did not attend their clinic appointment leaving 901 eyes of 452 patients to be reviewed. Figure 1 demonstrates the spread of glaucoma disease in GGC.

A total of 185 of 452 patients (41%) had OHT/POAG/POAG-suspect. A total of 100 eyes of 63 patients (13.9% of all new glaucoma referrals, 34.1% of OHT/POAG/POAG-suspect patients alone) were eligible for primary SLT. A total of 37 of the 63 patients (58.7%) would require bilateral treatment. Table 1 outlines the reasons why patients were not eligible for primary SLT.

In GGC there is currently 20 monthly SLT appointments; 21 additional SLT appointments each month would be required (105% increase in capacity) to treat new glaucoma patients.

Our study shows that around 15% of new glaucoma patients and a third of new POAG/OHT/POAG-suspect

patients alone are suitable for primary SLT. The LiGHT study

* Of the 97 OHT/ OAG Suspect patients, 46 had OHT and 51 were OAG Suspect

Fig. 1 Break down of glaucoma disease in GGC (n = 452 patients)

Table 1 Eyes not eligible for primary SLT (n = 801 eyes of 389 patients)

Reason for not being eligible	N (%)
No glaucoma	206 (25.7%)
NTG/NTG suspect	158 (19.7%)
Angle closure	137 (17.1%)
Previously treated OHT/OAG	124 (15.5%)
OHT/ Glaucoma suspect ^a	118 (14.7%)
Secondary glaucoma	37 (4.6%)
Advanced POAG	13 (1.6%)
Congenital glaucoma	3 (0.4%)
Unable to examine	2 (0.3%)
AMD	1 (0.12%)
VA <6/36	1 (0.1%)
IOP too high requiring diamox	1 (0.1%)

^aClinical features not meeting criteria stipulated in the NICE CG85 table for treating OHT

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showed that 74.2% of patients were drops free 36 months post-SLT treatment, no cases required filtration surgery (versus 3% if drops are used as first-line treatment), and £451 was saved per patient on specialist ophthalmology costs [3]. If our 63 new eligible glaucoma patients were treated with SLT then we could expect 47 case to be drops free at 36 months, avoid one trabeculectomy, and save NHS GGC £28,413. We hope other centers will review their glaucoma service in a similar fashion and encourage the trend towards primary SLT.

Compliance with ethical standards

Conflict of interest The authors declare that they have no conflict of interest.

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