

January 16, V.R.L. = 0.1 with -20 D. January 23, V.R.L. = 0.2 with -22 D. January 31, V.R.L. = 0.3 with -22 D. February 20, V.R. = 0.3 with -22 D.; V.L. = 0.3 with -24 D. March 11, V.R.L. = 0.3 with -23 D, and -24 D. The young patient is now ready to continue the study in the school with the sight-saving classes.

4. *The history of a young man who dispensed with the sight-saving classes.* G. V., 18 years of age, entered November 1, 1934, under No. 11338.

Diagnosis. High myopia, macular haemorrhages in both eyes.

History. Always sees badly at all distances. Has worn spectacles from the age of 13 years, only for reading.

V.R. = 0.02 with -16.0 D. sph. = 0.08; V.L. = 0.01 with -12.0 D. sph. = 0.04.

The treatment—as in the previous case.

November 6, V.R. = 0.15 with -16 D.; V.L. = 0.06 with -12 D. The treatment is stopped.

September 7, 1935, V.R. = 0.2 with -15 D.; V.L. = 0.2 with -18 D. September 11, V.R. = 0.3 with -15 D.; V.L. = 0.3 with -18 D. September 13, to the play in "ensemble" spectacles -13.0 D. sph. for the right eye and -16.0 D. sph. for the left are indicated. September 17, V.R. = 0.3 with -15.0 D.; V.L. = 0.4 with -18 D. September 23, V.R. = 0.4 with -15 D.; V.L. = 0.4 with -18 D. September 29, V.R. = 0.5 with -15 D.; V.L. = 0.5 with -18 D. October 7, V.R. = 0.5 with -15 D.; V.L. = 0.6 with -18 D. October 23, V.R. = 0.6 with -15 D.; V.L. = 0.7 with -18 D. November 26, V.R. = 0.7 with -15 D.; V.L. = 0.7 with -18 D. The treatment ceases.

September 3, 1936, V.R. = 0.6 with -14 D.; V.L. = 0.4 with -17 D. October 1, V.R. = 0.7 with -14 D.; V.L. = 0.5 with -17 D. The treatment is stopped.

We see that the successful first case is matched by the no less astonishing fourth case; that they both have been spared the sight-saving classes and the less happy cases—second and third—also received some benefit, but it is needful to keep in mind that to help a scholar to avoid sight-saving classes is only possible by improving his sight, not by throwing him from a school for the seeing to a college for the blind.

REFERENCE

1. KAZ, R. A.—Effectiveness of physiotherapy in ocular diseases. Works of the Ophthalmological Institute, Tome I, Leningrad, 1936.

ANNOTATIONS

Vaso-dilators in the treatment of tobacco amblyopia

The rationale of the treatment of tobacco amblyopia by vaso-dilators is based on the conception advanced by Maitland Ramsay in 1896 that vascular spasm is a factor in producing transient blindness from tobacco poisoning, a view that Parsons and others have also favoured. Some authorities have pointed out that there are no obvious ophthalmoscopic changes to be seen in the retinal circulation in tobacco amblyopia whilst others suggest that the vascular spasm affects the vessels supplying part of the chiasma. Usher has commented on the fact that visual recovery is more rapid

in those who have indulged in alcohol as well as tobacco than in those who have taken tobacco only.

In 1930 Pffimlin working on this vascular spasm hypothesis treated 11 patients suffering from tobacco amblyopia with injections of sodium nitrite twice weekly for 3-11 weeks, 73·3 per cent. recovered 6/12 vision or better and 46·6 per cent. had 6/6 or better in an average of 36 days.

Cordes and Harrington have reported six cases treated by subcutaneous injection of sodium nitrite on alternate days, 83·3 per cent. recovered 20/30 vision or better in an average of 24 days and 50 per cent. had 20/20 in both eyes in an average of 10 days.

Duggan in 1935 reported 24 cases which he had treated with 6 to 10 intravenous injections of sodium nitrite administered daily, 87·5 per cent. recovered 20/30 or better in one or both eyes in an average of 18 days and 50 per cent. had 20/20 in one or both eyes in an average of 30 days.

In a series of 22 cases treated by acetyl choline injections, 72·7 per cent. showed a visual improvement to 20/30 or better in at least one eye in an average of 14 days and 31·8 per cent. recovered 20/20 in an average of 13 days.

There is some dispute as to the manner in which these vasodilators act. Some authorities doubt whether vaso-dilatation of the retinal vessels occurs at all, others think that vaso-constriction takes place and some comment on the very transitory action that these drugs would exert on the vessels of the visual pathway, probably for not more than a few minutes.

However, whether the vascular spasm conception is correct or not and whatever the precise action of these vaso-dilator drugs may be on the vessels of the visual pathway there seems to be substantial clinical evidence to date that their use is of value in effecting a rapid recovery of visual acuity in tobacco amblyopia, for it is a fact that even mild and moderate cases require at least two or three months total abstinence for recovery of vision and in severe cases anything between five and thirty months may be necessary.

Some of the patients who received treatment by vaso-dilators in the series commented on above did not abstain from tobacco during treatment and yet showed visual improvement.

It seems that sodium nitrite is slower in effecting visual recovery than acetyl choline but that the degree of recovery with the former drug is greater than when the latter is used. This is probably due to the fact that sodium nitrite is destroyed, inactivated and excreted less rapidly than acetyl choline and so is able to maintain its vasodilator action longer: with acetyl choline the visual improvement is more rapid but it seems that ultimately it is less in degree than with sodium nitrite in the majority of cases reported to date.

Prevention of Industrial Eye Injuries

An exhibition dealing with the prevention of industrial eye injuries was opened at the Royal Eye Hospital by the Earl of Athlone, K.G., on June 22. Mr. Vernon Cargill, Chairman of the Hospital, opened the proceedings with an address in which he welcomed the Earl of Athlone and recalled the great interest which Her Majesty Queen Mary has always taken in the work of the Royal Eye Hospital. He pointed out that the numbers of eye injuries attending the hospital showed a steady increase over the past three years and amounted to 7,700 last year.

The hospital has set up an Industrial Eye Injuries Committee on which serve representatives of the National Safety First Association, the Home Office, Members of Parliament and members of the honorary staff of the Hospital. The result has been that an exhibition of protective devices will find a permanent home in the Out-patient Department.

The Earl of Athlone declared the exhibition open and congratulated the hospital on this pioneer movement. He emphasized the importance of prevention in this work.

Mr. Joseph Minton, who has done an immense amount of the spade work which has resulted in this movement, then gave a short address. He alluded to the new Factory Act which will enlarge the scope of compulsory use of goggles and other protective devices, and dealt with the problem of re-education of the one-eyed workman. At the end a film was shown which Messrs. Kodak had kindly prepared.

The Royal Eye Hospital is to be congratulated on this piece of pioneer work in a sight-saving campaign and it is to be hoped that other eye hospitals, especially in manufacturing centres, will soon follow their admirable lead.

ABSTRACTS

I.—SURGICAL OPERATIONS

- (1) **McArevey, J. B. (Dublin).**—Corneal transplantation in an aphakic eye. *Irish Jl. of Med. Sci.*, October, 1937.
- (1) **McArevey** here prints a communication made to the Section of Ophthalmology of the British Medical Association, Belfast, July, 1937. He emphasizes the importance of detailed examination of the anterior part of the globe and advises examination by means of