## SYMPTOMS AND HETEROPHORIA

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A heterophoria when decompensated is characterised by symptoms occurring generally after periods of intense close work or physical fatigue. The effort required in maintaining binocular single vision results in headaches, difficulty in changing focus, loss of accurate stereopsis and photophobia.

Headaches frontal, temporal or occipital, were round in 58% of the 500 cases checked (these cases were taken at random and covered a period of 20 years). The headaches could be severe, in some cases lasting for several days, and most patients associated them with their work. Some were due to sinus infection. Some patients appeared with those frightening large X-ray envelopes.

Difficulty in changing focus was not such a frequent symptom. 26%, mainly students, complained of it.

Loss of accurate stereopsis was noticed by tennis and squash players, golfers and bowlers, and of course teenagers, whose failure to judge the distance of the car ahead has been known to do several hundred dollars worth of damage to a parent's car.

Photophobia, our textbooks tell us, is experienced by exophores, but many esophores complain to me of the same discomfort and, unlike exophores, they seldom get relief from shutting one eye.

When binocular single vision becomes too difficult to maintain, the symptoms change, and the patient complains of diplopia or blurred vision. These two are linked together. If the patient has little or no supression he may notice the print going blurred immediately prior to it slipping in two. Blurred vision could also be due to relaxation of accommodation, in which case the patient would show an accommodation defect on the R.A.F. near point rule.

The orthoptist's job is initiated by routine testing, visual acuity, Worth lights, Maddox rod and wing, cover tests, and finally the test for binocular vision. The results of these tests in conjunction with an accurate history lead one to know what exercises are necessary to get the patient symptom-free.

The general pattern found after testing is a varying amount of suppression and, almost without exception, poor or inadequate convergence.

Routine orthoptic treatment is commenced by eliminating suppression. This is done by two methods, anti-suppression treatment on the synoptophore using graded slides with fine controls, and physiological diplopia taught as a home exercise. The elimination of suppression is the main reason why patients need to be seen regularly and why handout home exercises will generally fail. Once suppression has been eliminated so that diplopia is recognised when convergence fails, convergence training can be commenced.

Convergence training is carried out on a synoptophore and as a home exercise. It can be fascinating and frustrating. Fascinating when you watch the sheer concentrated struggle taking place, just to converge, until the later visit when the idea suddenly appears; and fascinating to see the patient's difficulty in accepting the fact that he must accommodate in order to go on converging. Frustrating when improvement is literally measured a degree at a time. One sees these esophorias with such stiff convergence that sometimes a form of jump convergence is the best treatment.

Those cases which show a marked accommodation defect deserve some mention, because they require a slightly different approach. Emphasis is placed at first on monocular and binocular accommodation using small print from a postcode book pasted on a tongue depressor. Once accommodation improves, so does convergence.

It is the orthoptist's job to realise that full convergence (one pen touching the tip of the nose) cannot be achieved by all patients and one must alter one's standards to suit the individual, his symptoms and his work. For example, accountants, students, draftsmen all need better and easier convergence than a housewife.

Although these cases present perhaps the easiest form of orthoptic treatment, they are a constant challenge because the symptoms are real and often severe. There is the battle of personalities, of the lazy person who feels her ophthalmologist has let her down ("after all a simple pair of glasses would be so much easier"). On the other hand one gets the refreshingly self disciplined person, who, providing she has little suppression, becomes symptom free and orthoptically satisfactory in two visits. Perhaps the most difficult patients are those elderly people who have had a symptom-producing heterophoria for years. They appear at a late age for treatment, at a time perhaps when their active life is slowing down and the need to read or watch television occupies more of each day; because of vast deep suppression and hopeless convergence little can be done to help them.

The treatment of symptoms associated with heterophoria is rewarding. The average length of treatment of the 500 cases reviewed was 6 treatments and 90% were symptom free following orthoptic treatment.

This paper was read at a combined meeting of ophthalmologists and orthoptists arranged by our NSW branch in 1977. I wish to express my thanks to my partner Pat Lance for looking after the percentages, to Maree Brown for listening to varied versions of this paper, and to Shayne Brown for asking me to read it.