



reasonable statistical analysis of the results can be carried out; it is desirable that measurements of ascorbic acid metabolism should be performed during the course of the trial in order to correlate changes in the symptoms with the form of therapy administered.

These criteria have been investigated during the last four years, during which 200 mg tablets of ascorbic acid and dummy tablets were administered daily to children in boarding schools during the seven winter months. The presence or absence of symptoms of the common cold, (*Tyrrell* 1965) was recorded daily. The results are now described from one female school containing 103 subjects of whom 57 received ascorbic acid and 46 received dummy tablets.

As a result of computer analysis it was found that the symptoms in all-the children could be separated into two unrelated groups consisting of sore throat, headache, feverish and out of sorts, defined as toxic colds; and cold in the head, cough, nasal obstruction and nasal discharge, defined as catarrhal colds. Ascorbic acid reduced the incidence, duration and severity of these symptoms in comparison with those in children receiving dummy tablets. The form of the toxic and catarrhal colds was also significantly altered so that symptom association was reduced in the presence of ascorbic acid. Duration of the symptoms, cold in the head and nasal discharge, in catarrhal colds, were reduced from fourteen to eight days in children receiving ascorbic acid. The girls who had received 200 mg ascorbic acid daily for three months had a level 60 ug/10° cells ascorbic acid in their white blood cells which was significantly higher than in the girls who received dummy tablets. The latter had a level of 42.5 ug/10° cells. Other measurements demonstrated that the plasma values of ascorbic acid is altered in young adults who have symptoms associated with the common cold. It is concluded that the prophylactic administration of ascorbic acid to young adults significantly reduces the intensity of the symptoms, and form of their association, in the common cold. This effect is correlated with a significant elevation in the tissue level of ascorbic acid.