permanently, and the structures referred to are too insignificant to be easily discerned in the rocks, if they have been preserved. Moseley went so far as to say that were the foot-jaws only larger they would, no doubt, occur in strata as old as the "Old Red Sandstone." Phylogeny or the study of the pedigrees of animal types, has available no generalized stem-form more interesting than the Prototracheate *Peripatus*.

A NOTE ON THE COLOURS OF TUMBLING MUSTARD SEED.

To those of us who have had to do with the seeds of Tumbling Mustard (*Sisymbrium altissemum*) it is well known that these are nearly always met with in mixtures of two distinct colours, one kind being light-yellow, and the other dark-greenish. As a rule the latter predominate to the extent of about three to one, but occasionally the proportions are the other way about, while still more rarely one colour may entirely dominate. Two or more instances of the last condition were brought to my attention during the winter of 1913, while I was with the Dominion Seed Branch, at Ottawa. In these cases, samples of flax harvested in Saskatchewan contained light coloured Tumbling Mustard Seeds only, their purity being so unusual that some doubt was thrown upon the authenticity of the determination, thoug the seeds did not differ in other respects. The only objection being, therefore, that they were all of one colour instead of being mixed.

During the autumn of 1914, my brother Stuart had occasion to collect a quantity of Tumbling Mustard seed, and in doing so visited a situation where the species had only recently become established, probably not more than four or five years. By that time, however, the plants had spread over a considerable area and were sufficiently numerous to provide more than a pint of seed. On examining the seed thus collected, it was at once observed that all were of the light yellow variety, thus establishing the fact that they had evidently bred true to type, and were therefore a distinct strain.

This at once led to further investigation, and it was then discovered that both colours were never met with together on individual plants, but that one plant would produce only yellow seeds and another only greenish. We have as yet found no exception to this rule though plants of both types are frequently met with growing side by side; in fact, they are seldom found otherwise, which would, of course, account for the two kinds being nearly always mixed in samples of cultivated seeds.

As the plants producing both kind of seeds are generally