know more about it, may prove to form a sixth group, the balance of "individuality," if I understand the meaning of the word, will still be on the side of New Zealand. Turning to the Carinate birds, *Harpagornis* stands alone, while *Cnemidornis* will certainly count for as much as the *Didida*. The extraordinary Mascarene Rails (*Miserythrus* and *Aphanapteryx*) are well represented by *Ocydromus*, which so much resembles them, and *Strigops* is undoubtedly a more abnormal form than, so far as we can judge, either *Lophopsittacus* or *Nicropsittacus*; just as *Nestor* is more aberrant than *Coracopsis*, and *Heterolocha* than either *Fregilufus* or *Nicropsar*. But there is no need to continue the list, and in conclusion I will only declare that I think far too highly of the fauna of Madagascar and of the Mascarene Islands to wish that its extraordinary peculiarities should be undervalued, though I do not want them to be unduly magnified at the expense of those of the fauna of New Zealand.

ALFRED NEWTON

Magdalene College, Cambridge, October 27

Eucalyptus

HAVING read with great interest the article in your journal (vol. xvi. p. 443) on the *Eucalyptus* I take the liberty of sending you a pamphlet on the same subject, in which I have endeavoured to unite all the arguments likely to persuade and convince the Italians of the immense utility of the above-named tree, the cultivation of which would be of the greatest importance for the *Agro Romano*.

As is well remarked in the article in NATURE, the *Eucalyptus* is extensively cultivated in France, Spain, and Portugal. But in Italy, where it prospers almost all over the country and might be cultivated with facility, in spite of the most earnest efforts on my part during my residence here for the last ten years, in spite of its being recommended in Parliament by one of the most influential members, it has not been adopted.

In my gardens on the Lake Maggiore, I cultivate forty different varieties of the *Eucalyptus*. Of these the *amygdalina* and the *globulus* have attained, in eight years, the height of 17 metres. It is to be remembered that the temperature has sometimes been as low as 7° C. below zero without injury to these plants.

If you consider it probable that these few words could be of interest to your readers I willingly authorise you to publish them in your estimable journal.

FRANCE PIERRE TROUBITZKOY

Villa Troubitzkoy, near Intra, Lago Maggiore, October 15

THESE trees are now attracting so much attention that even the small amount of experience I may be able to offer may not be unacceptable to your readers. Considerable stress is laid upon their influence in dissipating malaria; but I have not found this to be the case in Queensland, one of the head-quarters of the tree. I have personally suffered from malaria in the very heart of a forest extending for many miles in every direction, and composed mainly of all the varieties of *Eucalyptus*, and not by any means remarkable for the extent of swampy ground, and have known many instances of febrile attacks among shepherds and stockmen in the locality. Moreover I was told on inquiry that these attacks were not confined to any particular year, but that every year some cases might be expected. I was greatly surprised at reading in your "Notes" (NATURE, vol. xvi. p. 557) that the mosquitoes had disappeared with the introduction of the "gum" trees into Algeria. This would not be the experience of anyone who has lived in Australia, I believe. I have found these pests so intolerable on high land, where almost the only tree to be found was one variety or other of *Eucalyptus*, and sometimes all, that sleep was impossible while camping out at night, and life a burden in the day by reason of these pests. The gums emit a most decided odour, especially in strong sunlight. When riding across the great Queensland plains and approaching wooded spurs I have (*Scotch*) "felt" the characteristic smell of the gums at a considerable distance. These plains—ten miles in breadth—are not crossed in a short time, and the resinous odour of the gums, omnipresent in the forest and scarcely noticed there, strikes one forcibly when approaching the trees after the olfactory organs have been for some time deprived of it. Whether this odour has any effect or whether it is the preservative against malaria, I do not know. The growth of these trees in South America is very rapid. When in the Banda Oriental some years ago I examined a plantation of red and blue gums, then eight years old. The trees were at

least forty feet high, and many of them measured thirty-six inches in circumference at three feet from the ground. They had a profusion of foliage such as I have never seen on the same trees in Australia. This was right out on "pampa" land, in deep alluvial soil. These trees had fought their way up, in spite of the black ants so destructive to foliage—the owner told me that they had at first stripped the young trees—and the tremendous gales which sweep over this open country. Those to the westward and south-westward of the plantation were far inferior in size to those on the east and north. This was the only grove of *Eucalypti* in the Banda, and it demonstrates the possibility of covering the naked pampas to any extent with forest. English settlers in the River Plate countries should note this fact, and I am sure the enlightened owner of the Estancia "Sherenden" would supply any of his countrymen with seed.

ARTHUR NICOLS

Meteor of October 19, 6.15 P.M.

THE large meteor described by two correspondents (NATURE, vol. xvi. p. 551) was observed also by several persons in this district, but most of the accounts are so meagre and doubtful as to possess little scientific value. The meteor appears, however, to have been well seen by Mr. W. Watkins Old, of The Parade, Monmouth, and his notes are so interesting that I beg to transcribe them. He says:—

"The meteor fell at 6.15 exactly. It appeared to me to descend perpendicularly some degrees from and to the west of Arcturus (which was shining brightly), and it disappeared behind a bank of dark cloud above the horizon at a point in a line projected beyond Arcturus, half the distance between that star and the last of those in the tail of Ursa Major, as roughly shown in the diagram below:—

Thus it remained stationary, like a dazzling white wand, while I counted twenty, during which time I could perceive the vapour, of which the trail was composed, as it were in ebullition. It then gradually curved towards the north as depicted in the following sketch; and drifted slowly away during eight minutes,

until it lay almost horizontal though still brightly illuminated, while the clouds gradually rose and covered it from my view. Altogether I observed it over eight minutes by my watch. There was much twilight in the west and the moon was shining brightly from which one may judge the extreme brilliancy of the meteor. I should add that when it appeared there was simultaneously a sensible rent or flip, like one sometimes hears with a sharp flash of lightning, and which may possibly be due to the appulse of light, as it could scarcely be the sound of explosion if there was any. It was too simultaneous to be the report of the descent of the meteor through the air, but it was sufficiently loud to be pronounced and caused some people standing near me, with their backs to the west, to inquire what it was, though they evidently saw nothing of the meteor nor even turned towards its direction. I listened but heard no further sound."

Ashleydown, Bristol, October 26

W. F. DENNING.

Curious Phenomenon during the Late Gale

YOUR correspondent, "G. A. M." (vol. xvi. p. 551), may be interested to know that the "ball of fire" he saw descend on the evening of the 14th inst. was seen here by me, and by those who accompanied me, at precisely the same time (6.50 P.M.) that he mentions. We were walking in a south-easterly direction, and it seemed to fall from about half-way between that point of the compass and the moon, which was due south of us, and shining brightly. The ball itself appeared to us luminous white, while the "wake" left in its passage through the air, was bluish green. It was visible, I should say, for twenty seconds.