Within these enclosures are specimens of birds and animals as in the Zoological Gardens, London. This is what in somewhat pompous language is here called the Garden of Acclimatation, in which all sorts of trees are to become hardy, and all sorts of birds, beasts, insects, and creeping things are to be inured to the climate of Paris—the grand conception of some brilliant visionary. Not having seen the *Journal de la Société*, if there be one, or its *programme*, I don't know the limits assigned to this great idea, nor have I succeeded in learning anything of it more definite than what I have stated. You must therefore be contented with hearing what I saw, so far as experiments in acclimating plants are concerned. Be it known, then, to all men that the Society recognises the necessity of learning experimentally whether Pinus Sabiniana is hardy, and if Magnolia grandiflora will live out in winter. You English will stare at this when you remember that the Pinus is among the hardiest of all trees, and how good M. Boursault used to grow the Magnolia a quarter of a century ago in his garden in Paris. Another object of experiment is the Hungarian White Linden (Tilia alba), of which a wretched gouty individual, grafted half standard high, is perishing under the hands of some acclimatizing executioner. I mention these as examples of the childish way in which horticultural experiments (!) are conducted here. The whole affair is in that respect absurd. To be sure there are specimens of *Araucaria Bidwilli* and *excelsa* in tubs; but I could not make out how keeping them in such a manner was likely to solve any problem in the art of acclimatizing. In like manner I was equally perplexed to discover how it is proposed to acclimatise other species by growing them in a great conservatory or stove, I am not sure which, with a beck winding through the middle of some handsome "specimen" plants, as our fellow countrymen call them. But of this enough; it is not worth dwelling on such a subject. The situation is admirable: airy, dry, nicely wooded, and the very place for well conducted trials; and all must regret that the Garden of Plants, with its staff of highly educated, experienced officers and most able professors, should be doomed to inaction on the skirts of the wine market and dirty Rue Copeau, instead of being transferred to the beautiful Bois de Boulogne, now the resort of the best classes, who will neither drive nor walk to the miserable place where all the treasures of Paris in Natural History are literally stowed away. One redeeming feature in this Jardin d'Acclimatation must not however be forgotten. It has a capital *Magnanerie* or gallery of Silkworms, a very pretty building in which the worms of the Ailanthus, the Ricinus and the White Mulberry have been diligently employed all the summer in exhibiting themselves to the public, hard at work on the leaves to each peculiar. When I saw them last the leaves of Ailanthus were alive with young worms, and some great green fellows were nearly full grown. This was by far the most interesting object in the Garden. The prettiest is a tiny cottage made of Cane-work, and fitted up with charming Cane furniture, of which you cannot boast the like in England. I have close by me (*Rue de la Paix, No.* 25) a shop-full of such articles which I recommend everybody who can afford a guinea apiece for garden chairs to go and see. *V., Rue Castiglione.*

Orchids, Fertilization of.—I have been endeavouring during several years to make out the many contrivances by which British Orchids are fertilised through insect agency. I am very anxious to examine a few exotic forms. Several gentlemen have kindly sent me specimens; but I have not seen one of Lindley's grand division of Arethuseæ, which includes the Limodoridæ, Vanillidæ, &c. If any one would have the kindness to send me a few flowers and buds of any member of the group, packed in a small tin canister, by post, addressed as below, he would confer a very great favour on me. Would you have the kindness to inform me, if in your power, whether the late Professor Morren has published anything (and where) on the fertilisation of Orchids by insect agency? *Charles Darwin, Down, Bromley, Kent.* [We are unable to answer this question, and must refer it to others. After searching through Morren's multitudes of pamphlets, we find nothing on Orchids except an academical dissertation on Orchis latifolia, and some remarks on the cause of the movements in the lip of Megaclinium.]

Manuring Conifers.—I was struck by the caution given to avoid manuring Conifers, as I can well remember seeing outside of Holt, in Norfolk, Cromerwards, two plantations of Spruce and Larch, one on each side the road, well fenced in, and with boards painted opposite each other, with words as near as I recollect as follows:—"These are planted in well manured ground," and date. The other had on it—"These were planted in unmanured ground," date the same as on the other board. The manured trees were at least twice as high, and had a far more robust and healthy appearance than those unmanured. It is more than 20 years ago, and the boards may yet exist. I may also mention that a few years since I planted three Deodars, and the most sickly one, which I hardly expected to get up, I placed immediately over the spot where I had recently buried my splendid old favourite setter. At first it made very slow progress; but for the last two or or three years, when it may be supposed the roots had reached the dead carcase, the growth has become most vigorous, the colour of the foliage peculiarly beautiful, and its branches far more stout than the other two; which, however, are very handsome. Hence I infer that manuring many of the Conifers may be safely and advantageously practised. *Thomas Ingle, M.D., Emsworth, Hants.* —— In September, some eight or nine years ago, I had nearly the whole of my stock of Coniferous plants removed and heavily manured with half-rotten horse and cow dung. At the end of the same week the question was asked through your Paper whether or not the application of manure would injure an Araucaria. The reply was, "Yes, it is poison to the whole race." I thought if that is correct I have certainly committed a serious blunder, but I patiently waited and watched the result. Nothing could be more satisfactory than the growth and appearance of the plants the following season. Since then I have invariably applied manure whenever I removed plants of the kind in my own nursery, and always with the same satisfactory results. Therefore I have always recommended the application of manure whenever necessary, or an opportunity occurred for using it. As an illustration of what I have stated, I beg to say that about twelve months ago I sold a handsome specimen of Picea Nordmanniana to a lady in this neighbourhood, who always superintends and directs the transplantation of trees, &c., herself. A compost of manure and soil was prepared for this plant, including three barrow loads of the former. Nothing can exceed the healthful appearance of this tree just now; it has made sixteen inches of leader this season. *John Grier, Ambleside, Windermere.*—— Would your Correspondent "J. Philpotts" inform me whether the "good barrowfull of stable-dung" which he applied to his "Deodar and Picea Webbiana" was fresh from the stable or rotten? becanse I am of opinion that a mulching of any kind would be beneficial, inasmuch as it would keep the roots uniformly moist, and also prevent the ground from cooling by evaporation. Conifers forming a prominent feature in the grounds under my care, I am anxious to possess correct data respecting them. *Crostonian.*

Calceolarias (see p. 809).—I hail with pleasure the hint thrown out respecting the merits of the two kinds of Calceolarias, viz., shrubby or perpetual, and the herbaceous or annual kinds. Some five or six years ago I was induced to commence growing Calceolarias, as I saw clearly that the herbaceous kinds must wear out. I therefore selected some of the most healthy of the shrubby kinds to commence on, more particularly angustifolia, and a variety called Kayii, having proved them both to be healthy parents, and the result of my first batch was General Havelock, Emperor, &c. My object always has been to get decided fixed character and colour. I have now by me two plants of the same seedlings that I raised in 1857, and they measured when in perfection last season 4 feet through, and I am in hopes of saving them for next season. I quite agree with your Correspondent respecting the duration of the Calceolaria. I well remember seeing handsome shrubby kinds shown at Chiswick 30 years ago, and they made a beautiful display, and why should they not now, as any one can have my strain of shrubby kinds in bloom from May to October. My sorts are equally valuable for the border or flower garden, which makes them doubly useful. I have them now beautifully spotted and blotched, equally as rich in colour as the herbaceous kinds. *James Burley, Limpsfield, Surrey.*

Vines in Pots.—I exhibited on Thursday last three Grape Vines in pots at Worksop exhibition; they were admitted to be very superior to any at the show, and averaged 13 bunches each. To my surprise on entering the tent, after the judges had made their awards, I found a card containing these words placed on my Vines—"Disqualified—grown in open border." Now I have scores of witnesses who could prove that they were grown in pots, and that they had never been plunged, although they had partly rooted from the bottom or crock hole into some old tan on which they stood. These Vines were taken to Worksop and back in an open van, remained there all night in a crowded tent, the exhibition not having closed until 11 o'clock, and they are now at this moment fresh and good and still fit to be exhibited again. I had a large trellis made to fix the Vines on in order that they might travel safely, and had also a large forked iron placed into the pots to steady them. This caused me in order to balance the Vines to drop them into larger pots; I then filled the cavity with Moss and water to keep them from drying, knowing that they had to remain until the second day. I believe that I have stated all particulars in full. The schedule states only these words—"For the best three Vines in pots." Mine were decidedly the best. Can they withhold the prize from me on the grounds stated in their card above alluded to?—I feel that they cannot. Had the Vines been plunged and rooted all over the top of the pot they might have objected, but as the Vines were fairly grown in pots, as per schedule, and so exhibited, I believe that I can claim the prize, can I not? *Edward Bennett, Osberton Hall, Worksop, Notts.* [Undoubtedly.]

Orchard Houses.—Allow me to make a few remarks in answer to your very indulgent notice of my little pamphlet. I know you will pardon my taking exception to what you have said on fertilisation of Peach blooms; believing it to be a matter of necessity in many cases, I feel jealous of anything being said which has a tendency to lessen the idea of its importance. I am aware that some kinds will, when well ripened, set their blooms without assistance, but I have proved by experiment that it is unsafe to trust to others. The partially ripened state of the wood and almost total absence of bees, of course tend much to aggravate the consequences of neglect this season, but I have the most positive proof that manual fertilisation alone made the difference between a crop and a failure in several instances. There are four houses in this immediate neighbourhood which were all furnished from our nurseries with plants which had all been cultivated together. Two of these houses are under the care of good gardeners, and they are entire failures in point of fruit this season. These men acknowledged that they did not think it necessary to follow the advice they had received. The third house, erected by the same builder, and of the same size as the others, 60 × 20, is managed by a man who was a labourer a few years ago. Feeling in want of information he came over several times in the spring to have a talk with our foreman. His house has been full of very fine fruit, and his master says he has had to give much of it to his friends. The fourth case is still more striking; after nearly all our best plants were sold, and what were left were nearly in bloom, we had to fill an orchard house just built near Burton on Trent. Of course most of the trees were inferior to those supplied in the former cases. With the exception of being most tastefully painted and paved, this house was exactly built as the others, and by the same person. Being near the dwelling, and a new source of pleasure, the lady of the establishment took it into her own hands, and managed it entirely, and did not think it unnecessary to follow directions. Most of the plants fruited; some were full, and I will venture to say, for well ripened well grown trees, and perfectly clean foliage, she might challenge the country. In our own house we had not more than six or seven trees without fruit (though it had been crowded by sale trees the previous season); many bore from 30 to 50 Peaches of the finest quality, some few of which remain. From the 1st of August till the present date few have seen our house without tasting the fruit, and if you were to see the number of stones reserved for sowing and the seedlings of the two last years you would be more than ever convinced that Rivers' orchard houses are a great fact. One thing is certain—what has been done for years without a failure and at so little cost, others will be required to do. I could not help laughing when a nobleman's gardener came and offered 9*s.* a dozen for my Peaches only a few days ago. His Grapes are amongst the finest in England, but he has no Peaches this season nor any worth having last; and as the best walls are all occupied with Peach and Apricot trees, they are equally without fine Pears. When paying a visit last season to Mr. Ingram, at Belvoir Castle, and seeing the magnificent specimens of Pears grown on the walls, I could not help thinking how foolish it was to cover a south wall with glass for Peaches instead of building an orchard-house and planting the wall with Pears. *J. R. Pearson, Chilwell.*

Peas.—It may be important to many of your readers to know that Veitch's Perfection Pea will withstand drought and mildew better than most, perhaps any Pea, in cultivation. When other Peas can scarcely be kept alive with copious waterings it continues to produce abundance of tender Peas of excellent flavour. So convinced am I of its excellency that in future I will sow only it and Daniel O'Rourke, the latter for early gathering. *W. Craw, Westbury.*

Roses.—Will any of your readers give their experiences as to the two plagues which are now afflicting the Rose trees—mildew and thrips? The Roses have made excellent growth with me this year, and the show of buds for the autumnal bloom of Hybrid Perpetuals is most promising, but mildew attacks the new shoots, gets round the flower stalks and destroys the flowers. The Roses that escape this fate open for a day or two, and then go off as though they had been scorched, and are found to be infested with myriads of thrips. Does the same cause produce the two plagues, and are they to be attributed to the long drought we have had here? And what is the best remedy? I have dusted with flowers of sulphur all the mildewed parts of the trees, and in some cases have arrested the progress of the disease, but one class of Hybrid Perpetuals—the Géant, Lord Raglan, Cardinal Patrizzi, and General Jacqueminot—seems completely overpowered by the mildew. The thrips are a most grievous and provoking enemy. Yesterday I had a beautiful show of blooms just opening on Madame Laffay, Madame Vidot, and L'Enfant de Mont Carmel; this morning they are all destroyed. I shall be glad of any suggestions whether as to cause or remedy. The mildew does not seem to be due to any peculiarity of situation. My garden lies high, has pure air, and the plants out in the open are as much affected as those which are under the shrubbery trees, and many kinds are not touched at all, while the next tree is covered with mildew. China Roses are freest, and then the climbers, but Gloire de Dijon is slightly affected and has been kept in good condition only by our constant attention. Would you advise cutting in the young shoot that are most affected? Brennus seems specially liable to mildew. *Coventry.*

Vincas.—A writer in your columns (p. 699) states that he caused Vinca rosea to seed at the Royal Gardens, Kew, by imitating the action of an insect in inserting its proboscis, as I had succeeded with the common Periwinkle. By implication it may be pre-

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