1.—Trade and trading arrangements: Mr. Sterndale.

travelling with the flood tide over the reef towards the calm waters of the lagoon. These have been spawned in the deep sea or in the coral caves under the foaming surf which thunders on the outer reef, and seek, by some instinct of their nature, to make their own way into the placid waters enclosed within that stormy barrier. The oysters which are spawned within the lagoon are formed in congeries attached to the parent shells, or clustered in vast numbers fastened to one another in the holes of the rocks. The shell comes to maturity in about seven years, at which time its average weight is about one pound, exclusive of the fish contained in it. The usual size is about that of a soup-plate, or ten inches in diameter, although in rare instances they arrive at as much as eighteen. After this the creature perishes, detaches itself from the rock, opens to close no more, the fish decays, and the shell, becoming coated with coral and other stony parasites within and without, loses all value. The pearl-oyster is gregarious; wheresoever one is found, there are of a surety vast numbers somewhere in the immediate vicinity. They are found in coral caverns hanging from the roof, linked together after the manner of a chain, or clustered in large piles firmly attached to one another. This attachment is only temporary. It has been generally believed that the pearl oyster is a fixture, and certainly the appearance of the cable by which it binds itself to the rock would warrant that supposition. This apparatus has the look of a large tassel, consisting of an infinite number of slender filaments, each about the thickness of a packthread. It springs from the body of the fish, and passes through an orifice between the shells immediately next the hinge. During life its colour is iridescent, changing from a dark green to a golden bronze, exhibiting while in motion various prismatic hues. It fastens itself to the rugged rock with so determined a hold as frequently to require the utmost strength of a powerful man to tear it from them. Under these circumstances, it seems incredible that the creature should move from place to place. But, to borrow the words of Galileo, "Nevertheless it does move;" and under the influences of certain causes, these bivalves are in the habit of migrating *en masse*, not for any great distance, it is true, yet from one coral shelf to others in the immediate neighbourhood. As concerns the reason of their exodus, it might possibly be an alteration in the temperature of the water, caused by change of weather, or a scarcity of the animalculæ upon which the oyster feeds. The presence of drift sand is obnoxious to its comfort; consequently in the neighbourhood of banks and cays composed of that kind of débris it will not live. In lagoons which have no tideway it is not found, and if introduced there perishes. The experiment has frequently been tried, and its failure seems traceable to the following cause: Wheresoever sea-water becomes stagnant in the lagoons of the Pacific, there makes its appearance, in great numbers, a hideous reptile resembling a centipede, which is found from the smallest conceivable size up to a foot long: these enter and devour the oyster. They may have other enemies; this one is the most notable. Under favourable conditions the life of the pearl oyster would seem to be one of uninterrupted ease and passive enjoyment. Himself a creature most gloriously beautiful, his existence is passed among forms of the most surpassing loveliness, bathed in the cool, bright, unpolluted waters of the main. There he adheres to the side of some caverned cliff, covered with marine vegetation, and spreading out his ample beard (of which the dazzling colours when viewed in the light of the refracted sunshine, beaming through the liquid element in which he dwells, are like the tints of the opal, or of that stone which is called cat's-eye by the merchants of Ceylon), and sweeping around him his snaky tongue, he feeds daintily and waxes fat, and devotes the surplus of his nacreous secretion to the production of a precious gem, such as might haply be counted among the chief treasures of a kingdom, like the apocryphal eardrop which the wicked Queen of Egypt (upon whom Mark Antony was so fatally spooney) was said to have swallowed in a dram of vinegar; or the famous pendant which hung upon the bosom of that Lollia Paulina whose wealth in jewels was so enormous that she was entitled by the Roman people "the grave-pit and magazine of the conquering robbers of the universe." It may be as well to mention here that pearls are, under certain conditions, liable to a form of decay, or a loss of brilliancy, which impairs their value. A good preservative against such a contingency is to keep them in magnesia.

Surely his lines are cast in pleasant places, and his existence might be one of unalloyed happiness. Nevertheless, he has his afflictions. Some facetious writer speaks of an oyster as being "crossed in love." I know not how that may be, but this I have observed, that almost all well-grown pearl-oysters are infested by parasites, in the shape of a scarlet lobster about the size of a shrimp. This pestilent intruder introduces himself into the shell in conjunction, as it appears, with the partner of his joys, and making themselves a bed under the fat, soft body of their victim, resisting all attempts to dislodge them, rear their interesting progeny, and cause no end of pain and annoyance. The true cause of the production of pearls is, I believe, not known. It is supposed by many to be a disease in the fish; I am inclined to this opinion, and will state my reasons. In the first place, wheresoever a pearl-fishery is found of which the oysters grow to great size with a clean, smooth, outer surface, free from knots, humps, worm-holes, or other blemishes, in fact presenting every appearance of healthy and uninterrupted development—which is particularly noticeable in lagoons where the shells be wide apart—there will the pearls be extremely scarce, so much so that it would not pay to prosecute such a fishery for the profit to be derived from the pearls alone, although the shell is proportionately more valuable. On the other hand, where shells are closely crowded together, deformed by pressure, abnormally thickened about the base, having laminæ of which their outside is composed forced at their edges into an unnatural contact, so as to induce a belief that their growth had been stunted, as likewise being studded with warts and knots of a scabby appearance, being moreover honeycombed with small worm-holes which penetrate more or less deeply into the nacre—there will pearls most exceedingly abound. It is not uncommon for as many as a hundred pearls to be found in such a shell, though the presumption is that where they exist in such great numbers very few, and frequently none whatever, will possess any market value. But of the presence of the conditions necessary to the production of a pearl inside of an oyster, there is one very significant and certain sign, the faculty of detecting which can only be