BIJDRAGEN TOT DE KENNIS DER FAUNA VAN CURAÇAO.
Resultaten eener Reis van Dr. C. J. VAN DER HORST in 1920.

VARIA.

Of some groups of animals I collected only a very few specimens. Of others the material was rather abundant, but proved to be of insufficient interest to warrant the publication of special articles. Nevertheless as at least the records of localities may have some value, and some of them certainly have, I give below a summary of the reports of the various specialists who examined the material.

V. D. H.

MADREPORARIA

by C. J. VAN DER HORST.

As I have already pointed out in the Narrative of the Voyage (this journal Nr. 23) there is a marked difference between Caracasbay and Spanish Water, the former having clear blue ocean water, the latter being rather muddy. Spanish bay is quite the same as Caracasbay except that it is less sheltered against the tradewinds. Spanish Port is a narrow channel connecting Spanish Water with the bay and shows the transition in the different nature of the water. This difference has a great influence on the fauna as is shown especially by the coral population.

For the rest the coralfauna of the West Indies is extensively described by POURTALÈS (Ill. Cat. Mus. Comp. Zool. No. IV. 1871), VERRILL (Trans. Conn. Ac. Vol. 11. 1901), and VAUGHAN (The stony corals of the Porto Rican waters. U. S. Fish. Comm. Bull. Vol. 2. 1901; Some fossil corals from the elevated reefs of Curaçao, Arube and Bonaire. Samml. des geol. Reichsmus. in Leiden, 1901; Fossil corals from Central America, Cuba, and Porto Rico, with an account of the American tertiary, pleistocene, and recent coral reefs. Smiths. Inst. Bull. 103. 1919; etc.).

Only one or two species mentioned in the following are new for the West Indies.

Madracis decactis (Lyman).

Caracasbay, 13. V. 20, 7 fms., 1 spec.

This single colony, about 15 cm large, shows all the different modifications of growth that the species can have. One part is incrusting, another part irregularly massive, a third shows the short, stout, branched form.

Astrangia solitaria (Le S.).

Spanish Water, 9 spec.

Phyllangia americana M. Edw. et H.

Spanish Water, 6 spec.

Eusmilia fastigiata (Pallas).

Spanish Water, 5. V. 20, 1 spec., 18. V. 20, 1 spec.

Dichocoenia porcata M. Edw. et H.

Caracasbay, 27. IV. 20, 1 spec.

Mussa lacera (Pallas).

Spanish Water, 2 spec.

These two specimens are simple forms, formerly known as *Lithophyllia lacera*. VERRILL has

given good evidence that this is the young stage of *Mussa carduus* Ellis et Sol. The Museum at Amsterdam is in possession of several young specimens, some of which have infoldings of the margin and one has two separate calicles.

Mussa spec.

Spanish Water, 3 spec.

These 3 simple forms differ obviously from *Mussa lacera*; the septa are thin and are deeply laceratedly toothed. I feel inclined to consider them as *Mussa hartti*, a species described by VERRILL from the Brazilian coast.

Meandrina maeandrites (L.).

Off Santa Barbara, Curaçao, 21. V. 20. 1 spec.

Maeandra areolata (L.).

Spanish Water, 7 spec.

This species is very common in the Spanish Water, but is absent altogether in Caracasbay.

Maeandra clivosa (Ellis et Sol.).

Spanish Port, 19. V. 20, 1 spec.; Caracasbay, 10. IV. 20, 1 spec.; Spanish Water, 14. V. 20, 1 spec.

Maeandra labyrinthiformis (L.).

Caracasbay, 29. IV. 20, 3 spec.

Common in Caracasbay.

Maeandra strigosa (Dana).

Caracasbay, 10. IV. 20, 2 spec.; 7. IV. 20, 1 spec.; 27. IV. 20, 2 spec.; Spanish Water, 14. IV. 20, 2 spec.; 20. IV. 20, 1 spec.; Spanish Port, 19. V. 20, 1 spec.

Common in all localities but varying in form. In the clear water of Caracasbay the colonies attain a size of 1 m, and most of them are of a regular spherical shape. On the contrary in Spanish Water with its somewhat muddy consistency the colonies are ringshaped. They are dead in the center and live and grow only at the periphery.

Favia fragum (Esper).

Spanish Water, 21 spec.; Caracasbay, 6 spec.

I found this species very abundant in the Spanish Water, though all colonies are small, the largest one having a diameter of 7 cm.

Orbicella annularis (Ellis et Sol.).

Caracasbay, 9 spec.

This coral is absent in Spanish Water. In Caracasbay it is abundant and the colonies attain a size up to 1 m. Most of them are regularly globular with a smooth surface, but some have deep incisions.

Siderastrea radians (Pallas).

Spanish Water, 8 spec.; Caracasbay, 4 spec.

S. radians is found both in Caracasbay and Spanish Water, though it grows better in the latter locality.

Siderastrea siderea (Ellis et Sol.).

Spanish Water, 28 spec.; Spanish Port, 19. V. 20, 1 spec.

This species is very common in Spanish Water; in the Spanish Port it is rare and in Caracasbay absent altogether.

Agaricia agaricites (L.).

Spanish Water, 21 spec.; Caracasbay, 1 spec.

I agree with VAUGHAN that *Agaricia crassa* Verrill is only a special form of *A. agaricites*. If

the coral is attached to a small object so that extension of the base becomes limited, it develops the appearance of *A. crassa.*

Acropora cervicornis (Lam.).

Westpunt, 3 spec.; Caracasbay, 5 spec.

Caracasbay is full of large colonies of this species. It never grows near the surface like *A. palmata,* but prefers a depth of 5 to 10 m.

Acropora palmata (Lam.).

Caracasbay, 8 spec.

This species grows only in shallow water, near the very surface.

Acropora prolifera (Lam.).

Carascasbay, 1 spec.

This species seems to be rare near Curaçao, only two specimens having been seen at all. These were at a depth of about 1 m.

Acropora spec.

Spanish Water, 2 spec.

Whereas *Acropora* is very abundant in Caracasbay, I found only two specimens in Spanish Water though I was always looking for it. These two specimens were very poor, incrusting colonies, making it impossible to decide whether they belonged to *A. palmata* or *A. cervicornis.*

Porites astreoides Lam.

Spanish Water, 8 spec.; Caracasbay, 6 spec.

P. astreoides is abundant in Caracasbay growing up in large spherical colonies. In Spanish Water the species is rare, and the colonies do not look quite so healthy as in Caracasbay.

Porites furcata Lam.

Spanish Water, 7 spec.; Spanish Port, 3 spec.

This species is very abundant in both the above localities, while on the contrary it is rather rare in Caracasbay. In Spanish Water the colonies grow up to a height of 30 cm, and the repeatedly bifurcating branches become so densely crowded that in some colonies they fuse near the top forming a wavy platform. In Spanish Port the colonies are much smaller and in Caracasbay they were not found higher than 10 cm. The colonies in Spanish Water were crowded with all kinds of animals and provided in that way my richest collecting ground. In Spanish Water almost no animals sheltered themselves in the *Porites*-colonies, and in Caracasbay the colonies were quite clean and free from any other animal.

Porites porites Lam.

Spanish Water, 5 spec.; Caracasbay, 1 spec.

This species is not nearly so abundant as *P. furcata.* VAUGHAN is right in separating these two species. In Spanish Water they grow close together under the same physical conditions. *P. porites* can be recognized immediately by its much stouter branches. It attains an height of over 30 cm.

Porites branneri Rathbun.

Caracasbay, 1 spec.

This single specimen quite agrees with the description. It forms massive colonies like *P. astreoides* but may be easily distinguished from that species by the smaller calicles, the lack of a columella and the presence of 5 regularly formed pali. The largest specimen of RATHBUN was 65 mm. This colony from Curaçao has a diameter of 10 to 12 cm. It is certainly not a young specimen of *P. porites* as VAUGHAN suggests. Here to fore this species has been reported only from the Brazilian coast south of the Amazonas. This is the first record from the West Indies.