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WITH ONE PLATE AND THREE DIAGRAMS.

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MISSOURI BOTANICAL GARDEN LIBRARY he explains by suggesting that these embryo-like forms were fully developed animals characteristic of the early geological period at which they existed.

5. Letters from Alabama, chiefly relating to Natural History; by PHILIP HENRY GOSSE, F.R.S. London, 1859, pp. 306: small 8vo.-Another popular scientific work of this prolific writer. It consists of a series of letters written many years ago, when the author was teaching school in the interior of Alabama. In his usual interesting style, Mr. Gosse describes the habits and points out the beauties of many of our Southern plants, insects, reptiles and birds, with numerous illustrations on wood.

6. Sketch of a revision of the genera of Mithracidæ; by Wm. Stimp son.—The old genus Mithrax was divided into three groups by Milne Edwards, (Hist. Nat. des Crust., i. 318), Mithrax triangulaires, M. transversaux, and M. déprimés. These groups are now considered of generic value. For the first group De Haan has proposed the name Dione, which cannot however be adopted, as it was previously applied to a genus of Lepidoptera, by Hübner. It is also used for a bivalve shell. To the third group White gave the name Mithraculus, which was adopted by Dana.

In the Proceedings of the Zoological Society of London, 1847, p. 222, Mr. Adam White gives a wood-cut of a maioid crustacean, to which he applies the name Schizophrys, with the following description: "Carapax oval, depressed, somewhat attenuated behind; beak deeply cloven; upper orbit deeply cloven, with a strong tooth in the middle of the cleft; under orbit an elongated appendage on the inside, with two teeth at the end. Tale of male with 7 joints, the sides nearly parallel. Fore-legs shortest. Fingers without teeth." This genus, in the catalogue of the British Museum, is placed between Othonia and Pericera. But if we consider that by the "elongated appendage on the inside" of the orbit, Mr. White probable ably means the basal joint of the external antennæ, and observe how closely the figure corresponds to young crabs belonging to De Haan's genus Dione, the conclusion is unavoidable that Schizophrys is really synonymous with the Mithrax triangulaires of Milne-Edwards, and as such we here adopt it. In the following synopsis new characters are introduced; some new genera are described, and a list given of the species known up to the present date.

A. Maxillipedis externi merus margine antico integer.

MITHRACULUS, White. (Mithrax, pro parte, De Haan, Fauna Jap. Cr. 82.) Carapax depressus, rostro brevissimo vel nullo.—M. sculptus, (M. Edw.,) M. nodosus, (Bell,) M. denticulatus, (Bell,) M. coronatus, (Herbst.) M. cinctimanus, Stm.

B. Maxillipedis externi merus angulo antero-interno excisus, ad palpum

incipiendum.

a. Frons angusta. Orbitæ parvæ, profundæ, oculos pæne operientes MITHRAX, Leach. Carapax plus minusve transversus. Orbita multifissa, margine dentibus vel tuberculis armata.

1. Antennæ externæ articulus basalis spinis tribus armatus.—M. verru-

cosus, M.-Edw., M. aculeatus, (Herbst.)

2. Antennæ externæ articulus basalis spinis duabus armatus.—M. spinis sissimus (Tombo) 200 de diales de la companya (Tombo) 200 de la companya (Tombo) mosissimus, (Lamk.), M. hispidus, (Herbst,) M. ursus, Bell, M. rostratus, Bell, M. pygmæus, Bell, M. cornutus, De S., M. armatus, De S., M. tuber-

culatus, Stm.

Teleophrys, nov. gen. Carapax antice triangularis, postice et lateraliter rotundatus, sulco cervicali sat profundo. Orbita margine supero externoque integra, nec dentata.— T. cristulipes, Stm.

b. Frons lata. Oculi majores. Orbitæ grandes, non profundæ, late

fissæ, oculos non operientes.

Schizophrys, White. (Dione, De Haan.) Carapax ovato-triangularis. Rostrum longum, bifidum, cornibus bidentatis.—S. dichotoma, (Latr.) S. affinis, (De Haan,) S. aspera, (M.-Edw.), S. serrata, White, S. spinigera,

White, S. dama, (Herbst.)

Cyclomaia, nov. gen. Carapax orbiculatus, antrorsum quam retrorsum vix angustior. Rostrum brevissimum, bifidum, cornibus acutis, non dentatis. Oculi grandes, sat breves. Antennæ externæ articulus basalis trispinosus, spinis superne conspicuis. Maxillipidis externi merus apice interno profunde sinuatus. Pedes mediocres.—C. suborbicularis, Stm.

Cyclax, Dana. Cyclomaiæ carapacem affinis. Oculi longi; pedes

longi, tenues.— C. Perryi, Dana.

Mithraculus, Mithrax, and Teleophrys are American; Schizophrys,

Cyclomaia and Cyclax, old-world types.

7. Archiv für Naturgeschichte, vol. xxiv, for 1858; Berlin, 1859:—contains the following articles of special interest:—Anatomy and development of Copepoda, with 2 plates; Claus.—Descriptions of new Chilian Vertebrates by Dr. Philippi.—Revision of the Gadidæ, Soleinæ, and Plagusinæ; Kaup.—(Mr. Kaup considers our Morrhua pruinosa and M. americana as one species and identical with M. vulgaris!)—Geographical and historical remarks on certain mammals; Martens.—On the species of Velutina; Martens.—On Annelides of the Brazilian Coast, 2 plates; F. Müller.—Enthelminthica, 2 plates; Wagener.—Anatomy and Histology of some Trematodes; Walter.—New Batrachians, Günther.—On the hard-cheeked Acanthopterygians; Kaup. (The number of genera very much reduced.)—Critical remarks on Castelnau's Siluroids; Kner.

8. The Natural History Review and Quarterly Journal of Science, a periodical published at London and Dublin, containing reviews of works relating to Natural History, and also the proceedings of the Dublin Scientific Associations, as follows:—the Geological Society, the Natural History Society, the University Zoological and Botanical Association, the Royal Irish Academy, and the Royal Society. In giving a synopsis of the more important zoological papers read before these five Associations, we shall, for the sake of convenience, cite the "Quarterly Journal" instead of their own regular publications:—

their own regular publications:—
Vol. v. 1858, contains—p, 134, On new genera and species of Polyzoa,
4 plates; W. Thompson.—p. 148, Cambrian fossils, Histioderma, n. g.
(annelide); Kinahan.—p. 168, Steropis, a new genus of Carboniferous
Crustacea, allied to Limulus; Baily.—p. 194, On some Oniscoidea, with
a plate, Kinahan.—p. 202, New forms of Diastylidæ (wood-cuts); Bate.
—p. 207, On Oldhamia, a Cambrian fossil; Kinahan.—p. 276, Ancient
and modern races of Oxen in Ireland, (wood-cuts); Wilde.—Vol. vi., 1859,
p. 108, On the urticating organs of Actinia; M'Donnell.—p. 113, Irish