no cartilages being formed in this organ, which is destined to disappear with the gills. The hind limbs appear as buds at the base of the tail, and gradually attain their full development during the tadpole life. The fore limbs grow simultaneously, and even more rapidly, but remain concealed within a diverti­culum of the branchial chambers until fully formed, when they burst through the skin (unless the left spiraculum be utilized for the egress of the corresponding limb).

The above description applies to all European and North American tadpoles, and to the great majority of those known from the tropics. The following types are exceptional.

The circular lip is extremely developed in *Megalophrys montana,* and its funnel-shaped expansion, beset on the inner side with radiating series of horny teeth, acts as a surface-float, when the tadpole rests in a vertical position; the moment the tadpole sinks in the water the funnel collapses, taking on the form of a pair of horns, curling backwards along the side of the head; but, as they touch the surface again, it re-expands into a regular parachute.

In some species of *Rana* and *Staurois* inhabiting mountainous districts in south-eastern Asia, the larvae are adapted for life in torrents, being provided with a circular adhesive disk on the ventral surface behind the mouth, by means of which they are able to anchor themselves to stones.

In some Indian and Malay Engystomatids of the genera *Callula* and *Microhyla,* the tadpoles are remarkably transparent, and differ markedly in the structure of the buccal apparatus. There is no funnel-shaped lip, no horny teeth, and no beak. The spiraculum is median and opens far back, in front of the vent.

In the Aglossal *Xenopus,* the tadpoles are likewise devoid of circular lip, horny teeth, and beak, and they are further remarkable in the following respects: There is a long tentacle or barbel on each side of the mouth, which appears to represent the “ balancer ” *of* Urodele larvae; the spiraculum is paired, one on each side; the fore limbs develop externally, like the hind limbs.

Some tadpoles reach a very great size. The largest, that of *Pseudis paradoxa,* may measure a foot, the body being as large as a turkey’s egg. The perfect frog, after transformation, is smaller than the larva. *Pseudis* was first described by Marie Sibylle de Mérian (1647-1717), in her work on the fauna of Surinam (published first in 1705 at Amsterdam, republished in Latin in 1719), as a frog changing into a fish. Among European forms, some tadpoles of *Pelobates* attain a length of seven inches, the body being of the size of a hen’s egg. The tadpole of the North American bull-frog measures six inches, and that of the Chilian *Calyptocephalus gayi* seven and a half inches.

Authorities.—L. F. Héron-Royer and C. Van Bambeke, “ Le vestibule de la bouche chez les têtards des batraciens anoures d’Europe,” *Arch. Biol.,* ix. 1889, p. 185; F. E. Schulze, “ Über die inneren Kiemen der Batrachierlarven,” *Abh. Ak. Berl.,* 1888 and 1892; G. A. Boulenger, “A Synopsis of the Tadpoles of the European Batrachians,” *P.Z.S.,* 1891, p. 593; F. E. Beddard, “ Notes upon the Tadpole of *Xenopus laevis," P.Z.S.,* 1894, p. 101; ; S. Flower, “ Batrachians of the Malay Peninsula and Siam,” *P.Z.S.,* 1899, p. 885; H. S. Ferguson, “Travancore Batrachians,” J. *Bombay N.H. Soc.,* xv. 1904, p. 499. (G. A. B.)

**TAEL** (Malay *tail, tahil,* weight, probably connected with Hind. *tola,* weight), the name current in European usage for the Chinese *Hang* or ounce, the *Hang* of fine uncoined silver being the monetary unit throughout the Chinese empire. The *lael* is not a coin, the only silver currency, apart from imported dollars, being the ingots of silver known as “sycee”; the only other native currency is the copper “ cash.” As a money of account the *tael* is divided into 10 *mace (tsien),* 100 *conderin* or *candereen (fun),* 1000 *li.* The value varies with the price of silver. The “ Haikwan tael,” *i.e.* the custom-house tael, that in which duties are paid to the Imperial Maritime Customs, is a weight of 58-77 grains Troy, the value of which varies; thus it was reckoned at 3s. 1/10d. in 1905, 3s. 3½d. in 1906, 3s. 3d. in 1907, and 2s. 8d. in 1908 (see China: § *Finance).*

**TAENIA** (Gr. ταινία, ribbon, fillet), the term in architecture given to the projecting fillet which crowns the architrave of the Greek Doric order.

**TAFILÂLT,** or Tafilet (*i.e*. “ The Country of the Filáli,” as its inhabitants arc called, because descended from the Arabian tribe of Hilál, settled here in the 11th century), the most impor­tant oasis of the Moroccan Sahara, ten days’ journey south of Fez, across the Atlas. It is celebrated for its large and luscious dates, to the successful cultivation of which, soon after the arrival of an ancestor of the reigning dynasty of Morocco (hence called the Filáli Sharifs, *i.e.* descendants of Mahomet) *circ.* a.D. 1250, this dynasty owes its rise to power. Since 1648 it has been the custom of Moorish sultans to despatch superfluous sons and daughters to Tafilált, and as the males are all sharifs, the fanaticism against Europeans is comprehensible. Instead of living in towns its bellicose inhabitants occupy isolated fortified buildings, and are constantly at war. In Ifli, the central portion, formerly existed the town of Sagilmasa, founded by Miknása Berbers in 757 b.c. It was on the direct caravan route from the Niger to Tangier, and attained a considerable degree of prosperity. It was destroyed at the end of the 11th century, but its ruins still extend five miles along the river bank.

The first European to visit Tafilált was Rene Caillie (1828), the next Gerhard Rohlfs (1864). A later visit to the oasis by W. B. Harris is described in his book *Tafilet* (London, 1895).

**TAFT, LORADO** (i860- ), American sculptor, was born

at Elmwood, Illinois, on the 29th of April i860. He graduated from the University of Illinois in 1879, and from 1880 to 1883 studied in the École des Beaux Arts, Paris. In 1886 he became instructor at the Art Institute, Chicago, lecturing there, at the Chicago University, and elsewhere in the United States. He is the author of an exhaustive and authoritative work, *The History of American Sculpture* (1903). Among his works, in addition to much portraiture, are: “ Sleep of the Flowers ” and “ Awakening of the Flowers,” both made for the Columbian Exposition; “Despair” (1898); “Solitude of the Soul” (1900), and “ Fountain of the Lakes ” (1903).

**TAFT, WILLIAM HOWARD** (1857- ), the twenty-seventh

President of the United States, was born in Cincinnati, Ohio, on the 15th of September 1857. His father, Alphonso Taft (1810-1891), born in Townshend, Vermont, graduated at Yale College in 1833, became a tutor there, studied law at the Yale Law School, was admitted to the Connecticut bar in 1838, removed to Cincinnati in 1839, and became one of the most influential citizens of Ohio. He served as judge of the Superior Court (1865-72), as secretary of war (1876) and as attorney- general of the United States (1876-77) in President Grant’s cabinet; and as minister to Austria-Hungary (1882-84) and to Russia (1884-85).

William Howard Taft attended the public schools of Cincinnati, graduated at the Woodward High School of that city in 1874, and in the autumn entered Yale College, where he took high rank as a student and was prominent in athletics and in the social life of the institution. He graduated second (salutatorian) in his class in 1878, and began to study law in Cincinnati College, where he graduated in 1880, dividing the first prize for scholar­ship. He was admitted to the Ohio bar in 1880. For a few months he worked as a legal reporter for the Cincinnati *Times* (owned by his brother C. P. Taft), and then for the Cincinnati *Commercial.* Early in 1881 he was appointed assistant prose­cuting attorney of Hamilton county (in which Cincinnati is situated), but resigned in 1882 on being appointed collector of internal revenue of the United States for the first district of Ohio. The work was distasteful, however, and in 1883 he resigned to return to the law. From 1885 to 1887 he served as assistant solicitor of Hamilton county, and in the latter year was appointed judge of the Superior Court of Ohio to fill a vacancy. He was elected by the people in the next year and served until 1890, when he was appointed solicitor-general of the United States by President Benjamin Harrison. His work in connexion with the drafting of the Sherman Anti-Trust Act and with the Bering Sea controversy attracted attention. In 1892 he was appointed a judge of the Sixth Circuit, United States Court, and became known as a fearless administrator of the law. Several decisions were particularly objectionable to organized labour. The first of these, decided in 1890, upheld the verdict of a jury awarding damages to the Moores Lime Company, which had sustained a secondary boycott because it had sold material to a contractor who had been boycotted by Bricklayers’ Union No. 1. The second decision grew out of the attempt of the Brotherhood of Locomotive Engineers to prevent