by rearings of the insects in separate lots, fed upon green and red foliage respectively.

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CONE IN CONE

SIMILAR limestones of same geological age are seen high in the Missouri bluffs from the Platte and Buchanan County line to the Andrew County line. Beyond the Nodaway River we find these beds lower in the hills and within two miles are seen near the railroad grade.

These limestones are No. 150 and 152 of my section of the Upper Coal Measures, published in the Missouri Geological Report entitled "Iron Ores and Coal Fields," 1872, in part 2, page 92.

No. 150 occurs in strata of irregular thickness. Near Amazonia certain beds of it have been reported to make a good quality of hydraulic cement. Twenty feet is the total thickness of No. 150.

No. 152 lies above and is separated from 150 by two feet of clay shales. No. 152 is sometimes oolitic and also shows cross lamination. It furnishes an excellent building stone. Lander's quarry, a few miles north of Savannah, Andrew County, is of this rock. Overlying No. 152 we sometimes find a two-inch bed of cone in cone.

At only one other horizon in Missouri has cone in cone been obtained. It is found at Henry Kunkel's, on Nichols Creek, in Holt County, occupying a position approximately 175 feet above the other I have mentioned. Very fine specimens have been obtained from Nichols Creek, where it is about three inches thick.

The finest specimens of cone in cone I obtained from a branch of Dry Fork, in the northwest part of Bond County, Illinois, near James Valentine's and probably in Sec. 19 T. C. N. R. 4 W. Pocahontas is probably the nearest town. We found here twenty feet of argillaceous shale beds with flattened ironstone concretions resting on three feet of gray fossil-bearing limestones. The cone in cone occurs twenty feet above the limestone and is about two and a half inches thick. In composition it is an argillaceous limestone and shows perfect cones interlocking from each surface. It was traced along the branch for several hundred yards. [See Vol. VI., Ill. Geol. Surv., p. 133.]

In Geological Survey of Wisconsin, Iowa and Minnesota D. D. Owen, Phila., 1852, p. 112, mention is made of "Tutenmergel" being found in Iowa near certain briny springs. He states that in Germany its origin is thought to be from shrinkage of strata. But Owen speaks of it in Iowa and refers it to the imperfect crystallization produced by mineral matter filtering through marly beds. Dr. B. F. Shumard, who was much with Owen, informed me that Owen's tutenmergel was cone in cone. I think the former probably due to imperfect crystallization under pressure. Its origin and that of arragonite may be the same. Von Cotta speaks of it as "Tuten-nagel."

Stylolite structure, so common in many of our Lower Carboniferous limestones, may have a similar origin, but the cone is wanting.

G. C. BROADHEAD

COLUMBIA, MO.,
July, 1907

QUOTATIONS

EXTERNALISM IN AMERICAN UNIVERSITIES

IT is but natural, where organization is so important and the office of administration is magnified, that the presidency should fast lose its connection with active and advancing scholarship. There is so much governing to be done—because in our universities we trust so much to government—that in but few places can a president continue a scholar's life. So the old type of leader, learned and temperate, fast yields to the new type,—self-confident, incisive, Rooseveltian. And with the coming of the new type, there seems to be an increasing stress upon rapid accomplishment, upon "doing things," with grave risk that our places of learning will preserve a less clear vision of what is catholic and enduring.

The constitution of our universities is an