



# 内蒙古下渐新统梳趾鼠类一新属<sup>1)</sup>

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**关键词:**内蒙古,早渐新世,梳趾鼠超科

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1988-1989年中国科学院古脊椎动物与古人类研究所与中国人民解放军某给水部队联合考察队在对内蒙古阿拉善左旗乌兰塔塔尔地区的红层进行考察时,在克克阿木地点的下部红层中发现了一些哺乳动物化石,并称该动物群为克克阿木哺乳动物群(王伴月、王培玉,1991)。其中,有几件小哺乳动物化石可能代表梳趾鼠类一新属、种。现给予描述报道。

描述所用术语依 Wang (1997a)。IVPP V 中国科学院古脊椎动物与古人类研究所脊椎动物化石编号;h1 联合考察队野外化石地点层位编号。

## 梳趾鼠超科 *Ctenodactyloidea* Tullberg, 1899

### 内蒙孤鼠(新属、新种) *Ageitonomys neimongolensis* gen. et sp. nov.

(图1)

? *Ctenodactyloidea* gen. et sp. nov. Wang and Wang, 1991, p. 68

**正型标本** 左 M1-2 (IVPP V 15913.1)。

**归入标本** 2 段具 P4 的左上颌骨 (V 15913.2-3) 和 1 枚左 P4 (V 15913.4)。

**地点和层位** 内蒙古阿拉善左旗锡林高勒苏木扎哈布拉格东南约 11 km 的克克阿木地点 (h1-0), 早渐新世乌兰塔塔尔组的底部<sup>2)</sup>。

**特征** 小型梳趾鼠。上齿式:1013。颊齿为低冠的丘形齿,比例上较长窄,齿尖粗钝,齿脊低弱;原尖和次尖位置较外侧主尖明显靠后;原脊低,向后舌方斜伸;后脊向原尖斜伸;无原小尖;前齿带低短。P4 臼齿化。M1-2 次尖位于原尖正后方;内脊完全,长而直;内凹开阔;后小尖明显。

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2) 克克阿木地点红层的时代原认为是中渐新世早期(王伴月、王培玉,1991),后被改为早渐新世早期(王伴月,1997b)。

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**名称来源** 属名:*Ageitonomys*, *Ageiton* + *o* + *mys*; *Ageiton*, 希腊文, 孤立的, 单独的; *mys*, 希腊文, 鼠, 常作为鼠类名称的词尾。意为该化石代表梳趾鼠超科中孤立的一支。种名: *neimongolensis*, *neimongol* + *ensis* (地点名称词尾); *Neimongol*, 内蒙古, 化石产地。

**描述** 个体很小。上颌骨颧突后缘位于 P4 之前。上颌骨在 P4 之前的腹面稍凹, 未见任何齿槽的痕迹。P4 前面也无与其前的牙齿接触面的痕迹。这表明该动物是没有 P3 的。

颊齿齿冠低, 主齿尖粗钝, 齿脊低弱。M1 冠面为稍斜的四边形, 长大于宽。前尖较低小, 其余 3 主尖的大小和高低彼此均相近。原尖和次尖的位置较外侧主尖明显后移: 原尖与前尖和后尖约形成等腰三角形; 次尖位于原尖的正后方和后尖的后舌方。原脊低细, 斜向原尖延伸。无原小尖。后脊粗短, 向原尖方向斜伸, 但不与原尖相连。后小尖明显。内脊完全, 直而长。前齿带低短, 但比原脊稍高; 其两端不达齿的颊侧缘或舌侧缘, 也不与前尖或原尖连。后齿脊较前齿带发达, 但不与后尖连。前凹宽。中凹开阔, 颊侧开口, 并与后凹相通形成 U 形谷。内凹开阔, 横向短而对称。M2 与 M1 相似, 所不同的是 M2 的长与宽相近, 后脊的舌部为细而低的棱伸达原尖, 将中凹和后凹分开。P4 冠面为浑圆的四边形, 臼齿化。与 M1-2 不同在于, 其次尖位于原尖后舌侧, 齿脊更低弱些, 无后小尖存在等。

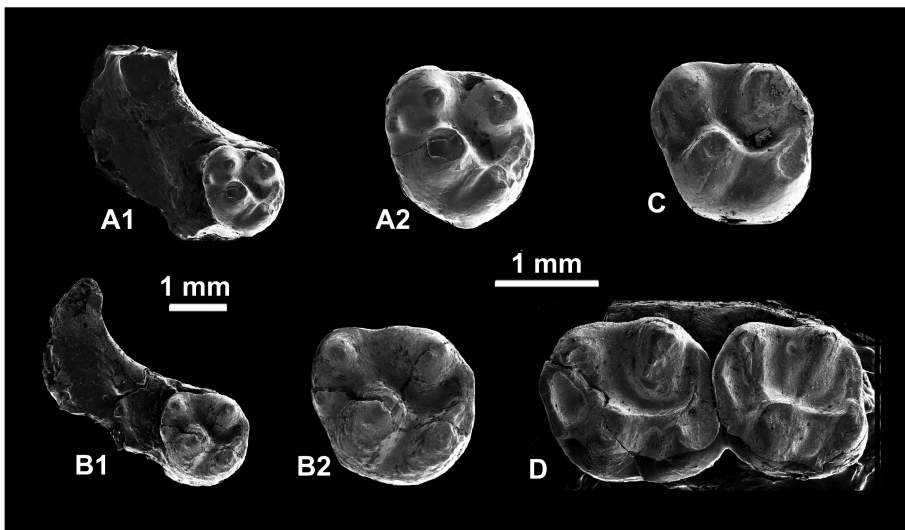


图1 内蒙孤鼠(新属、新种)部分上颌骨和颊齿冠面

Fig. 1 Occlusal view of fragments of maxillae and upper cheek teeth of *Ageitonomys neimongolensis* gen. et sp. nov.

A1. A fragment of left maxilla with P4 (V 15913. 2); A2. left P4 (V 15913. 2); B1. A fragment of left maxilla with P4 (V 15913. 3); B2. left P4 (V 15913. 3); C. left P4 (V 15913. 4); D. left M1-2 (V 15913. 1, holotype)

**测量** (长×宽, 单位: mm) P4, 0.8×0.8, 0.85×0.8, 0.75×0.8; M1-2 长: 1.65; M1: 0.95×0.85; M2: 0.8×0.8。

**比较** V 15913 个体很小,其颊齿的尺寸和 P4 白齿化的特点与梳趾鼠类豫鼠科的珍鼠(*Zoyphiomys*)和细鼠(*Zodionomys*)的相近(童永生,1997)。但后两个属的颊齿前后压缩,较宽短;原脊近于横向延伸;次尖明显向舌侧突,位于原尖的后舌方;内脊短而弱。此外,*Zoyphiomys*的颊齿为单面高冠,具很发达的耳状前齿带等。上述特点均与 V 15913 有明显的差别。V 15913 的白齿形态特征,如齿冠低,比例上较长窄,具粗钝的主尖和低的横脊,后脊向原尖斜伸,次尖位于原尖正后方,内脊完全,无原小尖,内凹开阔等均与戈壁鼠科的杨氏鼠 *Youngomys* (王伴月,2001a)的相似。但 V 15913 具白齿化的 P4 却使笔者无法将它归入该属。虽然 *Youngomys* 的已知标本中并无 P4 保存,但 *Youngomys* 具有非白齿化的 p4。在梳趾鼠超科中,P4 和 p4 的白齿化是同步的,即,P4/p4 或者均白齿化,或者均非白齿化。据此可以推断,*Youngomys* 应有非白齿化的 P4。这样,具白齿化 P4 的 V 15913 就不能被归入 *Youngomys* 属了。另一方面,V 15913 的上颊齿原尖和次尖相对于外侧主尖明显后移,以及原脊明显向后斜伸的特点也与 *Youngomys* 的不同,V 15913 应代表不同于 *Youngomys* 的新属、种,笔者称其为内蒙孤鼠 *Ageitonomys neimongolensis*。

**讨论** 梳趾鼠超科(Ctenodactyloidea)目前已知至少包括 6 科(钟健鼠科 Cocomyidae,似鼠科 Tamquammyidae,豫鼠科 Yuomyidae,饕鼠科 Chapattimyidae,戈壁鼠科 Gobiomyidae 和梳趾鼠科 Ctenodactylidae)。根据上前白齿的情况,上述各科大致可分为 3 大类(见王伴月,2001a: table 3):1) P4 非白齿化,具 P3,如 Cocomyidae, Tamquammyidae 和 Gobiomyidae (见 Dawson et al., 1984; 童永生,1997; 王伴月,2001b); 2) P4 非白齿化,但无 P3,如 Ctenodactylidae (见 Wang, 1997a); 3) P4 白齿化,具 P3,如 Yuomyidae 和 Chapattimyidae (Hussain et al., 1977; Dawson et al., 1984)等。此前,一直未见具白齿化的 P4,而无 P3 者。

由上面的描述可以看出,*Ageitonomys* 的 P4 虽白齿化,但确无 P3。这与上述各科均不相同。*Ageitonomys* 可能代表梳趾鼠超科中的第四种类型,也可能代表较上述第三类更进步的一类,是在演化过程中失去了 P3 的独特的一支,可能代表一新科。可惜现有的标本太零星,无法对其较高的分类单元作进一步的论证,暂将其归入梳趾鼠超科,不定科。

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**AGEITONOMYS NEIMONGOLENSIS GEN. ET SP. NOV.  
(CTENODACTYLOIDEA, RODENTIA, MAMMALIA) FROM EARLY  
OLIGOCENE OF NEI MONGOL, CHINA**

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**Key words** Nei Mongol, Early Oligocene, Ctenodactyloidea

**Summary**

Some specimens, collected from the Lower Oligocene of Nei Mongol, represent a new ge-

nus and species of the ctenodactyloids, and are described here.

### Ctenodactyloidea Tullberg, 1899

#### *Ageitonomys neimongolensis* gen. et sp. nov.

(Fig. 1)

? Ctenodactyloidea gen. et sp. nov. Wang and Wang, 1991, p. 68

**Holotype** Left M1-2 (IVPP V 15913.1).

**Referred specimens** Two left maxillary fragments with P4 (V 15913.2-3) and one left P4 (V 15913.4).

**Locality and horizon** Kekeamu in Alxa Left Banner of Nei Mongol (h1-0); Early Oligocene, base of the Ulanatal Formation.

**Diagnosis** Small-sized ctenodactyloid. Upper dental formula: 1013. Cheek teeth narrow and long, brachyo-bunodont, with obtuse main cusps, low and weak lophs; protocone and hypocone located more posteriorly than paracone and metacone respectively; low protoloph extending posterolingually; metaloph extending obliquely toward protocone; protoconule absent; anterior cingulum short and low. P4 molariform. M1-2 with long and straight entoloph, broad sinus and distinct metaconule, and hypocone posteriorly to protocone.

**Etymology** *Ageitonomys*, Ageiton + o + mys; Ageiton, Greek, neighborless, isolated, solitary, and mys, Greek suffix for mouse. Neimongol is the region where the fossils were collected.

**Description** Size is very small. The posterior margin of the zygomatic process of the maxilla is anterior to the P4. No alveolus for P3 has been detected, nor is any contact facet with P3 seen. It seems that no P3 is ever present during the life time of the animal.

The cheek teeth are brachyodont, with obtuse main cusps and low and weak lophs. M1 is longer than wide. The protocone and hypocone are located much more posteriorly than the paracone and metacone respectively. The hypocone is located posterior to the protocone. The low and slim protoloph extends posterolingually. No protoconule is seen. The thick and short metaloph extends obliquely toward the protocone, but does not meet the latter. The metaconule is distinct. The complete entoloph is long and straight. The anterior cingulum is low and short. The posteroloph is developed. The anterosinus is broad, and the broad mesosinus communicates with the posterosinus forming a U-shaped valley. The sinus is broad and symmetric. The M2 is similar to M1, but the metaloph is complete, with its slim lingual part meeting the protocone to separate the mesosinus from the posterosinus. The P4 is molariformed. It is different from the molars in having shorter and weaker lophs, and more lingually located hypocone and lacking metaconule.

**Comparison** V 15913 is similar to those of *Zoyphiomys* and *Zodiomys* in being small in size and having a molariformed P4. But V 15913 is more similar to *Youngomys* rather than *Zoyphiomys* and *Zodiomys* in certain features, as cheek teeth being brachyo-bunodont, relatively long, having hypocone located posterior to protocone, metaloph extending obliquely toward protocone, long and straight entoloph and broad sinus. As far as is known, *Youngomys* has a non-molariform p4. In addition to molariformed P4, V 15913 differs from *Youngomys* by the following features: the protocone and hypocone shifting more posteriorly relative to the paracone and metacone respectively, and the protoloph extending posterolingually instead of lingually. It seems more probably that V 15913 represents a new genus distinct from *Youngomys*, here named as *Ageitonomys neimongolensis*.

**Discussion** The Ctenodactyloidea are known to include 6 families (Cocomyidae, Tamquammyidae, Yuomyidae, Chapattimyidae, Gobiomyidae and Ctenodactylidae). Based on the upper premolars the ctenodactyloids can be separated into three groups (Wang, 2001a, table 3): 1) P4 non-molariform and P3 present; 2) P4 non-molariform, but P3 absent; 3) P4 molariform

and P3 present. Up to now no group is known to have a molariform P4, but lacks a P3.

The presence of a molariformed P4, but lack of a P3 render it impossible to assign the new genus *Ageitonomys* to any of the above 6 families of the Ctenodactyloidea. *Ageitonomys* may represent an unknown separate lineage (probably a new family) of the Ctenodactyloidea. The specimens of the new genus so far described are too scanty to erect a new family, *Ageitonomys* is temporarily referred to family incertae sedis of the Ctenodactyloidea.

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